



# COUNTY OF SANTA CRUZ

## PLANNING DEPARTMENT

701 OCEAN STREET, 4<sup>TH</sup> FLOOR, SANTA CRUZ, CA 95060  
 (831) 454-2580 FAX: (831) 454-2131 TDD: (831) 454-2123

**TOM BURNS, PLANNING DIRECTOR**

April 10, 2007

AGENDA DATE: April 24, 2007

Board of Supervisors  
 County of Santa Cruz  
 701 Ocean Street  
 Santa Cruz, California 95060

**Subject: Minimum Parcel Size to Qualify for TP Zoning**

Members of the Board:

Over the past decade there have been numerous public discussions related to timber harvest activities – both with regard to individual harvests (through the County’s authority to appeal timber harvest permits to the State Board of Forestry) and in the larger context of allowed land uses by zone district. As part of those discussions, in 1999-2000 your Board considered a report addressing several key land use issues related to timber, including a review of the minimum size parcel that can qualify to be rezoned to the Timber Production Zone District (TPZ). Because of a pending lawsuit with regard to these issues, those discussions were deferred. With the recent resolution of the lawsuit in the County’s favor, staff is returning this item at this time for further consideration in the context of events that have taken place since your 2000 discussions.

**History and Overview of TP Zoning**

The Forest Taxation Act of 1976 required counties throughout the state to enact what was then called Timber Preserve Zoning. That Act was later amended by the Timberland Productivity Act of 1982, which among other things, changed the name to the Timber Production Zone. Under that body of State law, local jurisdictions have limited power to regulate which properties are allowed into the TPZ District. As the Board recently discussed in the context of considering a number of applications to rezone properties to the TPZ District, if it can be demonstrated that a property currently meets or can within five years meet the minimum timber growing standards and meets minimum parcel size requirements, then a local jurisdiction has little latitude to deny the requested rezoning to TPZ. While the timber stocking standards are established in State law, local jurisdictions are given leeway in setting the minimum parcel size, up to 80 acres in size. When the TP Zone District was established in our County in 1978, the Board established five acres as the minimum size property eligible for consideration to the TPZ District.

Figure 1 illustrates the acreage spread of parcels currently zoned as TPZ, which currently includes 710 parcels containing over 64,000 acres.

	< 10 acres	10-20 acres	20-30 acres	30-40 acres	40-80 acres	> 80 acres
<b>Parcels</b>	134	42	48	63	201	222
<b>Acreage</b>	392	587	1,187	2,248	10,973	48,885

## Legal Context for Minimum Parcel Size Determination

Until recently, the significance of the minimum parcel size limitation for parcels rezoned into the TPZ District was of little concern. The main impact was whether a property was able to take advantage of the special property tax advantages associated with the TP zoning. However, that all changed when the County took the position in the late 1990s that, consistent with an Appeals Court decision in San Mateo County, the County could regulate where timber harvests could be allowed by our local zoning designations. (Under the Appeals Court ruling, while the County was not allowed to regulate the timber harvesting activities themselves, the Court found that local jurisdictions could regulate the location where timber harvesting activities can take place, as with other land uses.) Consistent with that Court decision, the County at that time established that timber harvesting was only allowed in the TPZ, Parks, Recreation, and Open Space (PR), Commercial Agriculture (CA)<sup>1</sup>, and Mineral Extraction (M-3) zone districts. Timber harvesting was no longer a permitted use in a number of rural zone districts, including A, RA, SU and RR. As a result, the California Department of Forestry (CDF) could only approve timber harvest permits on properties zoned TP, PR, CA, and M-3.

The County's action to exercise its zoning authority was ultimately challenged in the courts, with the final decision rendered by the State Supreme Court in 2006. In that decision, the Court found that the County had not exceeded its local land use authority by regulating where timber harvests could be allowed.

As a result of these actions, the importance of the threshold for TPZ minimum parcel size has become a significant policy issue. Those concerned about the potential impacts of timber harvest activities have embraced this tool as a means to limit the area where timber harvests can be allowed, while timber landowners and industry representatives have expressed concerns that use of this zoning tool could result in unfairly preempting timber harvest activities on a substantial acreage of rural properties.

## Policy Context

Before engaging in a discussion of the minimum parcel size issue, it is worthwhile to understand, in a larger context, the County's stated policy position with regard to timber harvesting activities. The County's General Plan includes as an objective the following statement:

*To encourage the orderly economic production of forest products on a sustained yield basis under high environmental standards, to protect the scenic and ecological values*

<sup>1</sup> At this time timber harvesting is allowed on CA zoned land only outside the Coastal Zone.

*of forested areas, and to allow orderly timber production consistent with the least possible environmental impacts. (1994 General Plan -- Objective 5.12)*

This objective clearly articulates the County's historic support for timber management and harvesting in the context of sound land management practices. The question before us, therefore, is not whether timber harvesting should be allowed in Santa Cruz County, but where the tool of zoning needs to be exercised to ensure meeting this objective.

In developing a specific recommendation on the minimum parcel size issue for your Board's consideration, staff first looked for guidance from existing land use policies and past Board actions. Those are discussed below.

#### Minimum Desirable Economic Unit

The concept of Minimum Desirable Economic Unit (MDEU) was developed by the County in 1977 to guide the initial policy decisions regarding TP zonings<sup>2</sup>. The concept was developed to better understand how a timberland owner might look at the economics of long term timber management of a particular property. As a result, its goal was to define the minimum parcel size needed to grow 200,000 board feet of timber on a 20-year cutting cycle. That analysis concluded that, "Parcels less than 20 acres in size have not been considered to be desirable economic units on a long-term basis. It has been found that where parcels are less than 20 acres, the factors listed below<sup>3</sup> become increasingly limiting, often becoming prohibitive to sustained yield management." The analysis also identified the different economic characteristics of the two primary forest types in the County, pure conifer and mixed evergreen, and discussed the variation in profitable parcel size dictated by the mix of trees on a parcel. The final conclusion of the report, however, identified 20 acres as the primary threshold of interest. Clearly, there are many changes that have occurred over the past 30 years that could impact this conclusion, but it nonetheless serves as an interesting starting point for the discussion.

#### General Plan

It is often useful to look to the County's General Plan for guidance on such land use policy issues. The following policy most directly speaks to the issue before us:

*Evaluate proposed land divisions and residential development permit applications on parcels larger than 20 gross acres designated Timber Resource on the General Plan and LCP Resources and Constraints Maps, but not zoned TP, for timber resource potential. Apply the TP land division and residential density requirement policies for any parcel found to have timber resources equivalent to TP parcels. Require, as a condition of any land division, rezoning to TP for parcels which have equivalent timber resources. (1994 General Plan – Policy 5.12.8)*

While this policy is not totally on point, as it focuses on establishing a trigger for requiring a discretionary application to be rezoned to TPZ in the context of other land use activities, it does

<sup>2</sup> See report to Board of Supervisors dated October 25, 1977.

<sup>3</sup> These factors include: quality and size of timber, availability of access, operational costs, physical constraints, availability of logs from outside areas, alternative adjacent land uses, current log prices, and the financial needs of the landowner.

suggest that efforts to rezone lands to TPZ should be focused on parcels larger than 20 acres in size.

### Survey of Other Communities

While Santa Cruz County presents some unique issues in terms of parcel sizes, zoning and the interface of timberlands with surrounding residential enclaves, it is worth understanding the statewide context for establishing the minimum parcel sizes for timber production. An updated survey of other counties was recently conducted, yielding the results summarized in Figure 2.

<b>Figure 2: Summary of Minimum TPZ Parcel Size by County</b>		
	<b>County</b>	<b>Minimum Acreage</b>
<b>Coast District Counties</b>		
	San Mateo County	30 acres
	Mendocino County	160 acres
	Del Norte County	20 acres
	Humboldt County	80 acres
<b>Other Counties</b>		
	Nevada County	40 acres (10 in special cases)
	Tehama County	160/40 acres
	Tuolumne County	160 acres
	Plumas County	40 acres
	Trinity County	160/40 acres
	Fresno County	40 acres
	Lake County	80/40 acres

It should be noted that Santa Clara, Monterey and Marin Counties do not have a TP zone district, but allow timber harvests in other zone districts.

Figure 2 illustrates a wide range of actions that have been taken by major timber counties. This sample suggests that increasing the minimum parcel size from five acres would certainly be consistent with actions taken in other counties in the state.

### Staff Analysis

It is worth noting that when your Board previously considered this item, in November of 2000, the Board conceptually approved increasing the minimum acreage from the current five-acre limit to 10 acres. Nonetheless, this analysis reevaluates the question in light of the change of circumstances that have occurred in the intervening years.

To get a better sense of the impact of various alternatives, staff has reviewed potential affected parcels by size range for the affected zoning categories – A, RA, SU, and RR. These gross numbers represent substantial rural acreage. However, recognizing that much of these lands are not suitable forestlands, staff has refined the analysis of gross eligible parcels by focusing only on those sites designated as containing timber resource, based on vegetative mapping.<sup>4</sup> While there are inherent problems relying on the accuracy of timber resource mapping on an

<sup>4</sup> It should be noted that this analysis includes the total acreage of any parcel that is even partially indicated as containing timber resources

individual parcel basis, staff believes that, when used on a cumulative basis, it is the better measure of the real impact of this pending policy decision.<sup>5</sup> Figure 3 summarizes the results of that analysis.

In using the timber resource based information, one can see that setting the minimum parcel size at 10 acres would eliminate up to 717 parcels containing up to 5,137 acres from future consideration for rezoning to TPZ and eligibility to obtain a timber harvest permit from CDF. Likewise, setting that standard at 20 acres would impact up to 1,286 parcels containing approximately 12,722 acres. Finally, setting the minimum at eighty acres would potentially impact 1,600 parcels containing over 22,000 acres.

**Figure 3: Analysis of Potential Candidate TPZ Parcels by Acreage Range<sup>6</sup>**

Possible Acreage Range Eliminated from Consideration for TP Rezoning	Parcels Without Regard to Timber Resource Mapping		Parcels Including Timber Resource Mapping <sup>7</sup>	
	Acreage	No. of Parcels	Acreage	No. of Parcels
<b>5-10 acres</b>	15,501	2,196	<b>5,138</b>	<b>717</b>
<b>5-20 acres</b>	34,509	3,605	<b>12,677</b>	<b>1,286</b>
<b>5-30 acres</b>	44,150	4,011	<b>16,672</b>	<b>1,459</b>
<b>5-40 acres</b>	49,061	4,152	<b>18,677</b>	<b>1,521</b>
<b>5-50 acres</b>	53,636	4,258	<b>20,482</b>	<b>1,566</b>
<b>5-60 acres</b>	55,906	4,300	<b>21,408</b>	<b>1,583</b>
<b>5-80 acres</b>	58,794	4,341	<b>22,539</b>	<b>1,600</b>
<b>&gt; 80 acres</b>	14,151	84	<b>7,255</b>	<b>41</b>
<b>TOTAL ACRES</b>	<b>72,946</b>	<b>4,425</b>	<b>29,794</b>	<b>1,641</b>

It is helpful, in order to fully appreciate the impact of these numbers, to review them in the context of the current parcels zoned to TP zoning – including over 64,000 acres – and the remaining potential additional acreage that could be rezoned under each scenario. Figure 4 illustrates a number of acreage scenarios within that larger context. For example, one can see that increasing the minimum acreage from 5 to 10 acres removes up to 5,138 acres from future TPZ consideration. Looked at in the context of potential additional TP lands, this policy change would impact sites containing up to 17% of the potential land currently eligible for TP rezonings. When looked at in the total context of all timber lands (including lands currently zoned TPZ) about 5% of the resource lands would be affected. Similarly, setting the standard at 20 acres would potentially impact 42% of the additional acreage, or 15% of the total timber acreage.

<sup>5</sup> These figures tend to overestimate the amount of acreage affected, due to how the timber resource mapping was used (see Footnote 3) and because smaller parcels will still be allowed to rezone to TPZ if they are adjacent to existing TP zoned parcels and under common ownership.

<sup>6</sup> Includes all lands zoned A, RA, SU, and RR

<sup>7</sup> Restricts analysis to parcels containing designated timber resource lands, based on vegetation types

<b>Figure 4: Putting Options into Perspective'</b>				
Possible Acreage Range Eliminated from Consideration for TP Rezoninas	Possible Acreage Removed	Remaining Eligible Additional Acreage	% of Total Potential Acreage Removed from Possible TPZ Consideration	% of Total Acreage removed from Potential and Existing TPZ
<b>5-10 acres</b>	5,138	24,656	17.24%	5.78%
<b>5-20 acres</b>	12,677	17,117	42.55%	15.58%
<b>5-30 acres</b>	16,672	13,122	55.96%	21.54%
<b>5-40 acres</b>	18,677	11,117	62.69%	24.77%
<b>5-60 acres</b>	21,408	8,386	71.85%	29.47%
<b>5-80 acres</b>				31.51%

From a public policy perspective, the determination of the appropriate minimum parcel size should be based, as are all zoning decisions, on protecting the larger public interests – including environmental concerns and impacts to the community. While there is not measurable data to make the case correlating parcel size with public impacts, based on our historic interaction with timber harvesting over the years, staff believes that the conflicts with harvesting activities tend to be higher on smaller parcels, in terms of access issues and neighborhood disputes. As well, owners of smaller parcels tend to not be as committed to long-term timber management, as their ultimate economic goal for the property is typically directed towards residential land uses, given our local land values. As a result, harvesting plans, access roads and other components of the harvests tend to focus more on shorter-term economic interests and preparing the sites for future residential uses, sometimes at the expense of the best resource management of the site.

From an economic viability perspective, industry representatives will tell us that while smaller parcels generally tend to be less economically viable in the long run, given the right access, slopes and timber stand, even a five-acre parcel can be effectively managed for a reasonable long-term economic return. At the same time, they will agree that there are 20+ acre parcels that, while they are designated as timber resource lands, will not lend themselves to long-term economically viable timber management. Therefore, one must resist setting a standard based on exceptional circumstances, and instead focus on the most typical situations.

In the end, we are left with a few key factors to guide this decision. The concept of MDEU, while dated, provides one guidepost – suggesting that the typical timber parcel less than 20 acres cannot be economically managed for timber production and extraction. As well, general guidance from the County's General Plan suggests that special attention be paid to parcels over 20 acres in size to evaluate for potential rezoning to TPZ – again suggesting that economic viability and management thresholds occur in the vicinity of a 20 acre parcel size. Finally, when considered in the context of what other counties have done throughout the state, 20 acres is the smallest TPZ size threshold that currently exists, with the exception the ten-acre size in Nevada County that requires special findings by the Board, and our own current five-acre minimum.

<sup>8</sup> Analysis based on total acreage of lands including any portion designated timber resource

## Conclusion/Recommendation

Staff would recommend that your Board revise the current 5-acre standard for qualifying for consideration for rezoning to TPZ to 20 acres. This recommendation should be seen for what it is – neither a blanket endorsement of allowing timber harvesting anywhere in the rural areas or a significant curtailment of the recent timber harvesting trends. Rather, this recommendation is attempting to balance the competing interests with regard to the inherent conflict between the growing rural residential population and responsible management of our valuable and renewable timber resources.

It is therefore RECOMMENDED that your Board take the following action:

1. Consider public comments on this item;
2. Select a 20-acre limit as the proposed change to the minimum parcel size for properties electing to rezone to TPZ; and
3. Direct staff to process the appropriate ordinance changes through environmental review and the Planning Commission, and then return to the Board for final action.

Sincerely,

  
 \_\_\_\_\_  
 Tom Burns  
 Planning Director

RECOMMENDED:

  
 \_\_\_\_\_  
 SUSAN A. MAURIELLO  
 County Administrative Officer

cc: County Counsel  
 California Department of Forestry, Central Coast Ranger Unit  
 California Coastal Commission  
 Santa Cruz Farm Bureau  
 Big Creek Lumber  
 Mark Morgenthaler, Citizens for Responsible Forest Management  
 Steven M. Butler  
 Sierra Club  
 Betsy Herbert  
 Summit Watershed Protection League  
 Valley Women's Club  
 J. E. Greig, Inc.  
 City of Santa Cruz Water Department  
 Redwood Empire  
 Roy Webster  
 Central Coast Forest Association  
 California Forestry Association  
 Dennis Kehoe, Esq.  
 Roger Burch  
 California Department of Forestry, Coast-Cascade Region

Minimum Parcel Size for TP Rezoning  
Agenda: April 24, 2007  
Page No. 8

San Lorenzo Valley Water District  
Lisa Rudnick  
Carol Carson  
Gary Paul

**About: 70 acre TPZ property at end of Porter Gulch road behind Cabrillo College and bordering Nisene State Park.**

**To: Santa Cruz Planning Dept/ Supervisors.**

**As owner of a 70acre TPZ I can only say that the TPZ zoning has:**

- 1. Allowed our family to be able to financially keep the forest property maintained and beautiful,**
- 2. With the help of Big Creek Lumber, to responsibly manage the property for forest beauty and integrity, wildlife, fire control, and 5 miles of hiking trail maintenance,**
- 3. Allowed the residents of Oak Park road to have emergency fire road access to and from their residential properties.**
- 4. Improved the health and growth of the forest through selective thinning, erosion control and replanting.**
- 5. Contributed additional hiking recreation area, to previously inaccessible forest, for many neighbors and friends.**
- 6. Provided additional recreation opportunities to Nisene visitors who happen to wander onto our trail system.**
- 7. Provided more than one instance of fire fighter access to power line and residential fire problems in the neighborhood.**
- 8. Provided educational opportunity for many school classes, community groups and State agencies to observe the beauty of a well maintained forest that benefits everybody.**

**I recommend that TPZ could continue on 20+ acre parcels. I invite any member of the board or planning department to visit the property, hike the trails and decide for yourselves.**

 3-29-07

**32**

**Robert Atlee- 523 Mountainview ,Swall Meadows CA 93514 rdatlee@aol.com 760-387-2109 phn &fax**

\* TO GRANDA HILL,  
3 PAGES.

Charles B. Atlee  
5080 Hacienda Ave.  
San Luis Obispo, CA 93401  
catlee@calpoly.edu  
DRAFT 3-23-06

The Atlee family requests the Santa Cruz County Board of Supervisors to consider **the** following information, **based** on our **past** fifty years of **ownership** of **property** in Santa Cruz County, in **determining** the minimum acreage requirement for TPZ zoning in Santa Cruz County, CA.

As a former Santa **Cruz** County UC Farm Advisor for ten **years** and a professor of Crop Science at Cal Poly University SLO for twenty two **years**, I **wish** to relate some of **our** family experiences in developing a **successful** Timber **Preserve** under the guidance of **Big** Creek Lumber Co. since **1965**.

In 1961 we purchased 68 **acres** of inaccessible **redwood** forest: from **Atty. Tom** Castberg at the upper end of Porter Gulch Rd. bordering what **is** now Nisene Marks State Park. **It** consisted of a hundred year **old** **stand** of **second** growth redwood. The forester from Big Creek **showed** us that **trees** were dying from competition in **some** **dense** groves. It was decided to enter into a **forest** management plan with Big Creek which involved a **careful** survey **followed** by a selected harvest permit which **would** permit thinning out competition of the **denser** groves. This was accomplished finally in 1980 when the acreage was logged yielding 600,000 board feet of first **quality** timber. **Care** was **used** to **first** **harvest** mature trees showing the most stress.

Following **are** results from **our** family "Timber Management **Program**" with Big Creek including a second timber harvest of 400,000 board feet of redwood in 1998: (my son **and** I personally worked with Big Creek forester Bob Reynolds in the selection of trees to harvest. It was a very educational weekend for us both.)

1. Forest evaluation by a **senior** Cal Poly forestry class as their senior project in **1980** indicated that **during** the **previous** ten years, since the first thinning harvest, growth rates of redwood had increased **nearly** 1,000%.
2. **The** forest served as a classroom for Cal Poly forestry students until Swanton Pacific Ranch was gifted to Poly.
3. The forest **proved** convenient to **also** serve **as** a classroom for Soquel High School biology classes.

4. The forest **also** has served as a model redwood forest exhibit .
- a. A **carefully protected** riparian corridor for wildlife **and** hiking now has a year round flowing spring.  
this is a walk in history as well as beauty.
  - b. **Young hybrid redwood seedlings, planted** by Big Creek in sparsely timbered **areas, are** thriving.
  - c. A second **logging** road was minimally maintained **to** provide fire control **access** as well as an emergency exit for neighbors along Oak Ridge Rd. **This** proved **necessary** after a downed PG&E power line started a brush fire along the property line.
  - d. Former logging roads **were** maintained only **as** hiking trails **for** neighbors and friends.
  - e. Controlled vehicle access has maintained water bars intact during winter rains resulting in zero erosion.
  - f. Crushed rock **was used on only** the entry **road** with a 10% grade.
  - g. **Logging** initially resulted **in** increased soil disturbance and **more** light which favored spread of **pampas** grass and milk thistle. These weeds are now controlled mostly by the improved **forest** growth.
  - h. **Our** extended **family of** children, grandchildren and friends has matured with a deep appreciation of the forest beauty **and** the realization that we are not just owners of the land but also stewards of it.

**From our** observations **of the** response of redwood forest growth **in** Santa Cruz **County, under the guidance** of a **qualified** timber management program, this can **be** a profitable and renewing experience for the forest **as well as its owners with a minimum of** maintenance. **Our** family input consists of minor trail clearing of downed limbs and some **poison** oak control. We could not have had a **better** family experience **during** the past nearly fifty years. We feel that It could have been done on half the redwood acreage.

**Charles B. Atlee, Professor Emeritus**  
Horticulture **and** Crop Science Dept.  
Cal Poly State University  
San Luis Obispo, CA

**J.C. Randolph**  
 1097 Pleasant Valley Rd.  
 Aptos, Ca 95003

March 19, 2007  
 Santa Cruz County Planning Commission and Board of Supervisors  
 4<sup>th</sup> Floor  
 701 Ocean kSt.  
 Santa Cruz, CA 95060

Re: Item 9 on Agenda for March 28, 2007 ( location of timber harvests)

Dear Members of the Planning Commission and the Board of Supervisors:

Please consider that restricting TP zoning to larger parcels will not take into account that smaller parcels are a part of larger timber resources in the same area.

A timber property which adjoins a forest and can be logged as part of a larger plan does not recognize the reality of the mix of parcel size and timber resources for many different reasons. An arbitrary lot size set at the maximum is unfair to the timber owner who has the same resource to manage as may a larger parcel next door.

As with fanning, there are occasional impacts to neighbors. but our County has found that managing an important resource is worth the effort of learning to live together. Timber is no different than most agricultural crops, and with proper logging practice, it can be more beautiful and less environmentally damaging than some other crops.

The County has made it nearly impossible to properly manage a forest not zoned for TP. Who wants to, or can, keep a forest healthy and beautiful if the timber can not be sold to pay for the cost of the upkeep of the land.

I am in favor of proper logging practice and careful enforcement of environmental laws, but not in favor of throwing the baby out with the bath water in an arbitrary ruling. Help us keep logging compatible, as you have helped keep farming compatible. Help us avoid a reactionary response to past abuses.

Please be fair, do not set an arbitrarily large acreage requirement on the TP zone.

Sincerely,



J.C. Randolph, Inc. CA License No. 754253 Fax: 831-761-9575  
 E-mail: John@JCRandolph.com

Telephone: 831-724-2499  
 Page 1 of 1

March 21, 2007

County Of **Santa Cruz**  
Planning Commission  
701 Ocean Street, 4<sup>th</sup> Floor  
Santa Cruz, CA **95060**

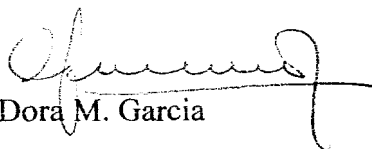
**RE:** Commission **hearing** on March 28, 2007 item # 9

Dear Commission:

We are writing this letter **to** contest the proposal of change ( increase in minimum size ) for rezoning to Timber Production Zone. Currently the minimum size is 5 acres. We think the change will definitely have a negative **impact** on SMALL LANDOWNER like us. We own a 20 acres in Boulder Creek area which has allowed us to perform selective harvest in the past. **Our** property is zone Special Use currently and we are awaiting for the **planning** department decision on our application for zone change at the present time.

Thank you for your consideration.

Sincerely,

  
Dora M. Garcia

Chris Christensen  
2780 Concord Way  
San Bruno CA 94066

March 20, 2007

Santa Cruz County Planning Commission  
701 Ocean Street 4th floor  
San Cruz CA 95060

Regarding item 9 on the agenda for March 28th, as a landowner in Santa Cruz County, I am opposed to any increase in the minimum parcel size required to rezone to Timber Production Zone. Please include this letter in the public record.

Thank you.

Chris Christensen  
Land owner (APN 057-01 1-72)  
Santa Cruz County

Daniel H. Dwyer  
23435 Sunset Drive  
Los Gatos, CA 95033

Santa Cruz Co. Planning Commission  
4th Floor  
701 Ocean Street  
Santa Cruz, CA 95060

March 23, 2007

Dear Sirs,

Regarding Item #9 for the March 28 agenda, I very much protest the County's continuing efforts to restrict the rights of forested owners. It's clear that you don't care about the letter or spirit of the law; you will get what you want no matter.

My wife and I own fifty-five acres of forest in Eureka Canyon above Correlates which we have no intention to log. The redwoods are still spreading across our property, and logging wouldn't be appropriate. We wouldn't log our land, even if it were a mature forest. But the proposed rule change says that logging cannot happen *no matter what the circumstances. No matter that there may be no injured neighbors, that foresters might believe it to be environmentally good, or that the revenues from the harvest might allow the land to remain undeveloped.*

This is a mindless, anti-logging policy. It shows that you have no interest in the state of the forest or the people who own it. You are ideologues and cowards, cowards who feel much safer attacking nice middle-class landowners, than standing up to noisy special interest groups.

Sincerely,



Daniel H. Dwyer

**Sarah Neuse**

---

**From:** Roger Haas [rogerhaas@mail.cruzio.com]  
**Sent:** Tuesday, March 27, 2007 9:03 AM  
**To:** Env Planning  
**cc:** Sarah Neuse  
**Subject:** Fw: Section 13.10

This email was returned for first time.

----- Original Message -----

**From:** Roger Haas  
**To:** [pln320@co.santa-cruz-ca-us](mailto:pln320@co.santa-cruz-ca-us)  
**Sent:** Tuesday, March 27, 2007 8:18 AM  
**Subject:** Section 13.10

As a small timber land owner in the Santa Cruz Mountain I urge you not to change the size of parcel that can be down zoned into TPZ. The wise management of the forest land in the county will require tinning or burns to get the number of trees per acre back toward a prelogging forest density. If no tinning is allowed then we will have lands that has a managed forest and a tooth pick forest next door of unhealthy trees.

Roger Haas  
Partner Haas Family Partnership.  
117 Spreading Oak Drive  
Santa Cruz, California  
95066

**Sarah Neuse**

---

**From:** pelphreyp@aol.com  
**Sent:** Tuesday, March 27, 2007 10:08 AM  
**To:** Sarah Neuse  
**cc:** Sarah Neuse  
**Subject:** AGENDA FOR MARCH 28th Item #9

TO: SANTA CRUZ COUNTY PLANNING COMMISSION  
PROJECT PLANNER: SARAH NEUSE

AS A SMALL TIMBERLAND OWNER AND OPERATOR I AM OPPOSED TO ANY CHANGES TO THE CURRENT SIZE OF ACREAGE THAT CAN BE REZONED. THE PARCELS WE OWN RANGE FROM 5 TO 25 ACRES. BY CHANGING THE ORDINANCE TO A LARGER MINIMUM SIZE YOU WILL MAKE OUR LAND WORTHLESS AND PUT ME OUT OF WORK.

THANK YOU.

DENNIS AND CANDY PELPHREY  
16018 COMSTOCK MILL RD  
LOS GATOS, CA

---

AOL now *offers free email to everyone*. Find out more about what's free from AOL at AOL.com.

Santa Cruz County Planning Department  
4<sup>th</sup> floor, 701 Ocean Street  
Santa Cruz, CA 95060

April 18,2007

Please include this letter in the staff report for the upcoming BoS item regarding requirements to rezone parcels to TPZ.

Any proposed change to the current acreage requirements to rezone timberland to the Timber Production Zone (TPZ) requires a full Environmental Impact Report. Any other route will yield an arbitrary number based on non-scientific information.

The cumulative impacts of the ever-increasing number of timber regulations should be carefully considered. There are more than 1000 State Board of Forestry regulations governing timber harvesting locally, as well as a growing number of extremely onerous regulations from several state and federal agencies. In 1999, the State Board of Forestry adopted several additional local regulations including the following:

926.23 Contents of .Plan [Santa Cruz County]

In addition to **14** CCR 1034 the following shall apply in Santa Cruz County:

When log hauling is proposed over non-appurtenant private roads, the RPF shall provide:

- (1) Information substantiating the timber owner’s legal right to access or use said private road(s).
- (2) A statement as to the estimated number of total logging truck loads to be removed and the approximate number of haul days and location of proposed logging truck staging areas.
- (3) A statement as to how obligations to maintain the road shall be satisfied commensurate with use.
- (4) Specific measures which provide for the safe use of the road, such as flag persons, signage, pilot cars and hours of restriction.
- (5) Videotape, photograph or other means of documentation for noting the existing conditions of the road.
- (b) The RPF shall provide a map showing the location of the flagged property boundaries along with any documentation that substantiates -the property line.
- (c) The description of the plan area shall include the County Assessor Parcel Number(s) for those parcel(s) within which timber operations are to be conducted.
- (d) The RPF shall include within the notice to the landowner section of the plan the following statement: “Section 16.22.030 of the County Code states that any road or bridge constructed pursuant to a Timber Harvest Permit issued by the State of California. if used to serve purposes other than forest management activities shall be considered new and shall be subject to all County design standards and applicable policies including County grading and bridge permits.”

I include this specific rule since misinformation has been provided to the Supervisors on this issue of access.

Also, I notice on the Planning Commission agenda for April 25<sup>th</sup>, an item affecting land use on rural properties of 10 acres and less. This “groundwater recharge’ item was before the Board of Supervisors previously, so they should be familiar with the more stringent regulations currently being crafted which may affect the property rights of rural land owners. This too should be considered as pertinent to the timber discussion.

Smaller properties with a zoning such as “Special Use” which have long carried a higher tax rate in order to be allowed additional uses of their private property should be fully compensated for any loss of property value as well as refunded the amount of the higher tax rate if their right to rezone to TPZ is eliminated.

The majority of smaller forested parcels in this county are owned by individual families. These families will be greatly impacted by any increase in the acreage size required in order to rezone to TPZ. For many families, their trees are their savings account. Additionally, it is through a selective timber harvest that roads and culverts are upgraded, and necessary fuel reductions can occur. Once zoned as TP, it is extremely difficult to change the zoning for a different use, contrary to popular urban legends.

Lastly but most importantly, all landowners who are potentially affected by any proposed change in policy should be notified by the County of Santa Cruz of all public hearings on this issue. This obligation should not fall onto the shoulders of private citizens.

Sincerely,

Lisa Rudnick  
Ben Lomond, CA

April 17, 2007

Santa Cruz County Board of Supervisors  
701 Ocean Street  
Santa Cruz, CA 95060

**RE: Hearing on TPZ acreage limitation.**

Dear Supervisors:

The County of Santa Cruz has talked big for many years about how much value it places on "open space". One gets the impression there could be nothing finer than wide expanses of undeveloped land in the County's view. Here is a golden opportunity to make good on these goals.

The best way to maintain open space is to make it profitable for the owners of that space to leave it in that condition. It creates an incentive. In a government's toolbox, the most expedient tools are tax structure and zoning rules. Using these tools you can make it profitable and desirable to leave land as open space. The most effective "open space" zoning is TP; the land remains in private hands, which relieves government from the burden of maintaining that land; it remains on the tax rolls; it is nearly impossible to use the land as anything other than open space. The whole point of the zoning is to leave the land as open space for timber production (aka "growing forests").

A TP zoning is not a *carte blanche* to harvest timber; all of the timber harvest regulations and requirements must still be met before any timber moves. The County of Santa Cruz lies in the CDF Southern Subdistrict, which only allows selective *harvests* on a ten year or longer rotation. Thus, the rezoning of a property does not mean the owner is going to immediately run a timber harvest, he merely retains his right to do so some time in the future. Nor is it easy to cut timber and rezone back to a non-timber zoning. Once you are in TP, the land must remain forest land; it is very hard and expensive to change out of TP. Check your records; just how many parcels do you have recorded that have changed from TP to another designation?

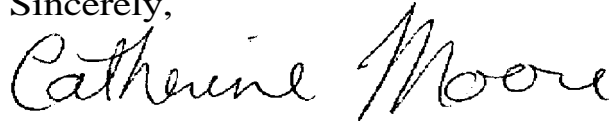
When people buy a parcel of land, they check its zoning designations to learn what they may do with that land. In the past, parcels of zonings other than TP were still able to harvest timber, and many of those owners want to keep that option. A timber harvest can provide the money to pay for the land's expenses or put in needed improvements, such as fish-friendly stream crossings or erosion control measures. A timber harvest can reduce fuel loads and improve fire safety for the area.

People who zone their land TP are dedicated to maintaining their land as open space. They don't want to subdivide or build commercial tracts; they don't

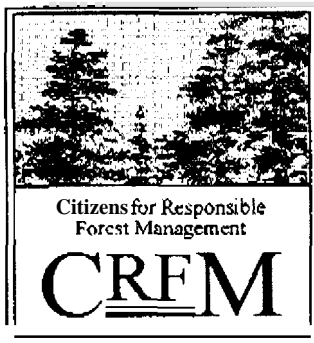
**want to grow row crops. If the County is truly interested in maintaining its open space, it will make it easy for these people to achieve their goals, not continue to throw up road blocks.**

**Thank you for your attention.**

Sincerely,

A handwritten signature in cursive script that reads "Catherine Moore".

**Catherine Moore, landowner  
1700 Eagle Tree Lane  
Felton, CA 95018**



**Citizens for Responsible  
Forest Management**  
P.O. Box 167  
Boulder Creek, CA 95006

April 18, 2007

Board of Supervisors  
Santa Cruz County  
701 Ocean Street  
Santa Cruz, CA 95062

Re: Timber Production Zone parcel size

Dear Board members,

During the 1990's, there **was** a marked influx of aggressive out-of-county logging companies and absentee landowners who bought parcels, logged them and often subsequently sold them for development. (Several local landowners did so as well.) **Redwood** Empire, Eel River Sawmills and others bought so many **acres** that it began to look alarmingly **like an** invasion.

Suddenly, landings **and** logging roads, which would normally have failed County regulations, became house sites and driveways. Erosion **was** commonplace **as** road after road was **cut** into the forests. **Log jams** at bridges occurred as careless loggers left logs in the creeks rather than getting them out **as** required by law. In winter, after heavy rains, the beaches were inundated **with** all kinds of debris, from huge logs to tons of slash, which the City had to remove at **great cost**.

Often these companies bought smaller parcels situated within quiet communities. This **led** to many conflicts, **as** most local homeowners **did** not want 80,000 lb. log trucks **using** their narrow residential roads. They were concerned about their children waiting for school busses, local car **traffic** having to compete with log trucks, the impact all **that** heavy equipment would have on the roadbeds and the hazards **of** helicopters ferrying logs through the **air**.

The timber companies from Humboldt and Mendocino counties were accustomed to large acreages **located** remotely with no human habitation. This is not the **case** here in **Santa Cruz** County, where there **is** a definite urban-forest interface with communities scattered throughout **the** forests. The conflicts that timber harvesting created between **residents** and loggers led to many unpleasant stand-offs. While **folks** who logged could do anything they wanted to their properties, **they** were denying their neighbors **the** use and enjoyment of theirs.

Finally in 1997, the County convened a Timber Technical **Advisory** Committee, where both sides could meet, voice their concerns and work toward a solution. Included were Planning Department personnel, forest industry workers and actively concerned citizens. For over a year, **we** debated, compromised **and** worked on items that could **diminish the** conflicts **and** protect our erosive **soils** and fragile riparian habitats. We designed **a** solution, and after both **sides** agreed on the terms, we presented our **proposal.** to the Board of Forestry in Sacramento.

However, Big Creek Lumber, after initially agreeing with the proposal, publicly petitioned the Board of Forestry **against** implementing it, and that Board then rejected our proposal.

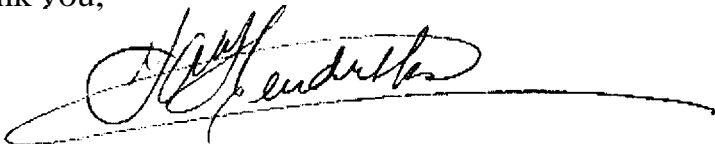
With no other options left, the **County** Board of **Supervisors** attempted **a** compromise for controlling "where", but not "how", logging could take place through zoning. The Board enacted several zoning changes. Landowners who owned non-TPZ parcels and wanted to harvest the timber would be required to meet certain criteria, such as **parcel size** and **stocking** standards, **and** the County temporarily reduced the fees for them to rezone their parcels to TPZ. The whole objective of the zoning was to **minimize** the conflicts between neighbors, **and** industrial **scale** timber harvesting **was** and still **is** an incompatible use in small neighborhoods.

We have personally **experienced** the huge **upheaval** and disturbance of logging operations adjacent to our property, **and** were heavily impacted by it for many months.

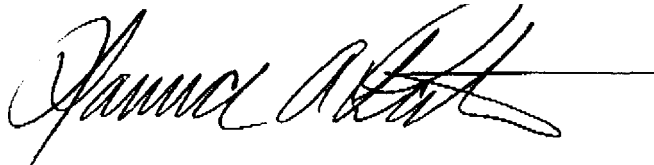
These conflicts **will** continue **unless** there are buffers in place. Buffers can be **attained** by requiring a minimum size parcel for timber harvesting. Therefore, **we ask** that you enact a **minimum** parcel size that makes sense in our surroundings, specifically the very intricate forest-urban interface prevalent in many **parts** of this county.

All other counties that allow timber harvesting have **a** 40, 80 or 160 acre parcel size. We request that you consider a **minimum** 80 acre **size.**

Thank you,



Julie Hendriks, Director



Lawrence Prather, Director

**TO:** Santa Cruz County Planning Department And Board Of Supervisors

**REZONING  
For Timber Production  
MINIMUM ACREAGE REQUIREMENTS**

I **strongly support keeping** the Lowest possible acreage Requirement For TPZ.

Raising **size** will create Hardship on many people who depend on Their “Hanked Timber” for current and future income.

Raising **size** will result in a “taking” **and** could lead to Lawsuits for such against the County.

Timber is one of few Renewable Resources available. Sustainability Of same is Vital!

Small parcels are usually owned by individuals and family units. How would you feel about having the USE of your property and Income being **taken** by “Government” with no Renumeration?

Respectfully  
Lowell Webb

To: Santa Cruz County Board of Supervisors and Santa Cruz County Planning Department.

**RE: upcoming decision on minimum acreage requirements to rezone to TPZ**

Members of *the* board:

The bottom line on minimum acreage is this: Parcel acreage should have little or no bearing on whether a particular parcel *can* be considered for TPZ. If the parcel contains enough timber to sustain periodic selective harvesting, as certified by a registered professional Forester, then it should qualify. There is no incentive for a Registered Professional Forester to agree to assist in rezoning a piece of property to TPZ if he/she doesn't believe the parcel can be reasonably *managed* for timber production. Board Members need to get beyond politics and at least say the real issue is.....stop harvesting! Then they need to ask themselves if they feel conservation easements (*both* agricultural and Timber related) are a good thing?

TPZ after all is just a very specific contract to keep the land in open space.

Respectfully submitted for your consideration

Frank Estrada  
140 Hazel Dell Road  
Watsonville California  
95076

#32

To ; Santa Cruz County Board of Supervisors and Santa Cruz County Planning Department.

**RE: upcoming decision on minimum acreage requirements to rezone to TPZ**

Members of the board I realize the proposal to change the minimum requirements of parcel size to and increased amount of up to 80 acres is before you for a decision. I am appealing to you to investigate the reason that this proposal is before you. Statements have been made to make you believe that the change would reduce the number of instances that a bad timber harvest will occur and that it would reduce the conflict of use between neighbors to the adjacent properties. The truth of the matter is that the number of harvests in Santa Cruz County that have resulted these bad results are very few and in fact have been the result of violating many of the existing rules of the county and the State. These individuals are unscrupulous and should be punished for there disregard for the laws, land, and neighbors. The people that engage in this type of behavior are the ones that the focus of change should be on. These people should have been sited and fined, perhaps jailed. You could consider county ordinances that would make this type of behavior more punishable, cause the land titles to become clouded, not allow further use permits to move forward with any land use. Until the offending property makes whole all of the damages that they created. This would punish bad behavior.

By changing the parcel size as proposed you punish and take an asset from responsible property owners that have not participated in and poor land use practices and have been good Stewarts of the land. I do not understand why taking property rights and asset value from non offenders improve anything.

It is my belief that the real reason that the proposed change is before you is a fundamental dislike of logging by people in the County of Santa Cruz that have been influencing in the decision makers of our county.

Logging has been a major part of Santa Cruz County for over 100 years the amount of standing timber in the county today is a result of these collective past practices. The county has in the past communicated that sustainable timber harvest practices are the correct and proper use of the timber resources. Much of the timber in the county is currently in parks and preserves; the balance is a resource that can and should be managed by professional Foresters and responsible land use, There is no licensed Forester that is going to develop and promote a bad harvest plan and present it to the County for approval. If land has an amount of marketable timber on it and it can be harvested responsibly, then the parcel size should not matter but the use of best practices should prevail.

Lets please use the facts of a proposal and the professional good judgments to decide if a harvest plan should be presented to the County and lets have the County make its decisions based on these facts and good judgment

Respectfully: submitted  
Grant Estrada  
394 Mt Madonna Road  
Watsonville, California  
95076

#32



Santa Cruz Group of the Ventana Chapter  
PO Box 604, Santa Cruz CA. 95061 831-426-4453  
[www.ventana.sierraclub.org](http://www.ventana.sierraclub.org)  
[santacruzstaff@ventanasierraclub.org](mailto:santacruzstaff@ventanasierraclub.org)

April 19, 2007

Board of Supervisors  
Santa Cruz County  
County Building  
701 Ocean Street  
Santa Cruz, CA 95062

Re: TPZ - increase of minimum parcel size

Dear members of the Board,

This letter is being submitted on behalf of the Santa Cruz Group of the Sierra Club regarding the upcoming item on your April 24<sup>th</sup> agenda on raising the minimum acreage size required to rezone parcels to Timber Production Zone (TPZ). The Sierra Club has given much thought to this issue and presents the following recommendations with supporting facts and figures.

First, we would like to ask your Board to approve an increase of the minimum parcel size for rezoning to TPZ to 80 acres, the maximum allowable under the Timberland Productivity Act (TPA). Secondly, we believe the County should use the definition of 'parcel' as defined in the TPA, or *'that portion of an assessor's parcel that is timberland as defined.'* Use of this definition does not require the County to apply multiple zone designations to any given Assessor's Parcel, but would require a minimum amount of timberland be present to qualify for rezoning to TPZ.

The definition of 'Timberland' per the TPA "means privately owned land, or land acquired for state forest purposes, which is *devoted to and used for growing and harvesting timber*, or for growing and harvesting timber and compatible uses, and which is capable of growing an average annual volume of wood fiber of at least 15 cubic feet per acre." (emphasis added). We suggest that the county could and should require that any new lands to be rezoned to TPZ be "devoted to and used for growing and harvesting timber" as indicated by previous approved timber harvest plans. Any parcel that does not meet this criterion can be deemed to not meet the state definition for rezoning.

We have heard the arguments that we are trying to put the timber industry out of business, that we are opposed to all logging, that development causes worse problems than logging and that TPZ protects land from development. We provide the following discussions to discredit those arguments.

#32 1

We include data below (provided by your Planning Department) to show that more than 72,000 acres of mapped timberland are currently available for logging in Santa Cruz County and an increase in the minimum parcel size for rezoning (even up to 80 acres) can't lower this number. We are not opposed to all logging, but continue to have concerns about how some logging is done in this area. Logging is just one industry/land use in Santa Cruz County, along with agriculture, tourism, commercial use, light industry and residential use. Santa Cruz is a significant bedroom community to Silicon Valley, and is also home to a top-notch state University (UCSC) and a quality community college (Cabrillo College). We are physically constrained by the Monterey Bay and the Santa Cruz Mountains. In order to accommodate multiple uses, conflicting uses must find a way to co-exist or cease.

All of Santa Cruz County's drinking water comes from our own forested watershed lands. We have an obligation to protect our water quality and quantity as water becomes more scarce and as Global Climate Change brings about more uncertain weather conditions, including drought and floods. Scientific data shows that adequate tree cover protects both the quantity and quality of water produced within those forested areas. "Mature forests provide three ecosystem functions of direct relevance to water utility watersheds; (1) older forests have a higher capacity for intercepting fog and rain (FEMAT, 1993), (2) they maintain a low soil-erosion potential, and (3) they enhance channel stability by producing woody debris with longer retention times because of their size and resistance to decay (Harmon et al, 1986)'

Local timber harvest regulation allows for harvesting every ten years. Loggers prefer to remove the larger trees from the forest for obvious economic reasons, opening up the canopy in the process, increasing run-off during the winter period and allowing the generally moist forest floor to dry out. Slash (limbs and tops), a by-product of tree removal equivalent to kindling, is left in place up to three feet in depth, increasing fire hazard in our heavily urbanized residential mountain areas.

Selection silviculture requires an extensive road system which is used in successive harvests. Research indicates that roads are a major contributing factor to increased sediment loads in streams, seriously impacting water purveyors' ability to utilize the water. According to Herbert, "Florsheim et al (2000) cite numerous studies that have documented 'the link between roads, increased flow, and sediment production related to gullies, road surface erosion, and culvert failure in steep and forested areas.'"<sup>2</sup>

While poor road maintenance on residential properties is also a contributing factor to increased stream sediment loads, the solution is not more logging, but better county code enforcement.

In fact, county data from 1994 showed that between 1987 and 1993 an average of 39% of logged parcels changed ownership following logging, with a low of 19% and a high of 63% with an average of development permits on 38% of those parcels. While we have heard

---

<sup>1</sup> Herbert, Elizabeth, "Forest management by West Coast water utilities: Protecting the source?": Journal **AWWA**, February 2007, pg 95.

<sup>2</sup> *Ibid*, pg 95

repeatedly that if we don't allow logging we will encourage development, logging leading to development has been the reality in this county. Staff has told us that those levels have decreased somewhat in recent years. We can guess that this may be because the county's zoning ordinances limiting logging largely to TPZ parcels has reduced the number of 'exploitative' harvests from landowners in it for the money and not for long-term timber management. Due to the original criteria developed by staff and approved by the Board of Supervisors, the majority of parcels put in the TP zone district were larger than 40 acres.

Remember, the TPA was created to protect the timberlands of the state for long-term timber management, "the long term productivity of the forest resource". It was not designed to allow timberland owners to 'cut and run'. By raising the minimum parcel size, your Board will discourage landowners who are only in it for the 'buck'. The county determined in 1977 that smaller parcels were not viable economic units for long-term timber management and took this into consideration when originally required by the State to rezone all qualifying parcels to TPZ. See below, for more information.

In addition to the problem of logging as a pre-cursor to development, other unforeseen economic costs from logging are passed onto our community. Logging debris mobilized by excessive run-off has damaged county bridges, and 80,000 lb fully-loaded log trucks have added significantly more wear and tear to mountain roads than individual automobile trips.<sup>3</sup> Logging has adversely impacted drinking water quality and increased sediment loads are also a problem for our Federally-listed 'endangered' coho salmon and State-listed 'threatened' steelhead trout populations. The majority of Santa Cruz County streams are listed under the Clean Water Act section 303(d) as water quality impaired for sediment. Logging has been cited as a contributing factor.<sup>4</sup>

## Background

In 1976 the Timberland Productivity Act (TPA) was passed and required all counties to zone lands "assessed for growing and harvesting timber as the highest and best use of the land" as Timber Preserve Zone (TPZ) This has since been changed to Timber Production Zone. These parcels would be put on the 'A' list. All 'A' list parcels, except those contested, were required to be zoned to TPZ. Santa Cruz County had none.

The TPA also required counties to "assemble a list of all parcels, "which, ...appeared in the judgment of the assessor to constitute timberland, but which were not assessed for growing and harvesting timber as the highest and best use of the land." These comprised the 'B' list. All such parcels were to be rezoned to TPZ "unless the owner can demonstrate to the satisfaction of a majority of the full board that it would not be in the public interest for such parcel(s) to be zoned as TPZ."

---

<sup>3</sup> The General Accounting Office reported that an 80,000lb vehicle causes the equivalent wear and tear to state highways as approx. 9,500 automobile trips.

<sup>4</sup> i.e., the State has recently approved a Total Maximum Daily Load (TMDL) for sediment for the Pajaro River. Timber harvesting activities were identified as a source of the sediment. [http://www.swrcb.ca.gov/tmdl/303d\\_lists2006.html](http://www.swrcb.ca.gov/tmdl/303d_lists2006.html)

At the Board of Supervisor's Hearing on February 21<sup>st</sup>, 1978, Santa Cruz County Supervisors approved the 'B' list and zoned the majority of the parcels on that list as TPZ. Approximately 45 contested parcels were deleted.

Prior to the hearing, Planning Staff did an extensive analysis of parcels with timber resource, including interviews conducted with local foresters and various 'B' list property owners. Staff developed six principal factors that were used to determine which parcels ought to be included on the 'B' list. These factors were:

- **Vegetation** ("quantity, quality and distribution of existing or potential vegetation especially hardwoods and conifers. Whether or not a parcel meets MDEU (Minimum Desirable Economic Unit-(see below) criteria is a major consideration.")
- **Topography** ("physical factors which would adversely affect the growing and/or harvesting of timber." "Especially significant would be excessively steep slopes, cliffs or riparian corridors which would prohibit the establishment of roads or skid trails...")
- **Access** (characteristics "which would prohibit trucks from hauling to and from the site")
- **Surrounding Land Uses** ("adjacent parcels in small lot (urban) size ownerships, zoning is a residential district, and General Plan designates the vicinity as urban reserve").
- **Soil Type** ("soils which would preclude the parcel's ability to grow harvestable volumes of timber")
- **Environmental Factors** ("highly erodable watershed areas, unique wildlife habitats, or important scenic resources on the property")

In addition, Planning Staff made a recommendation that all parcels on the 'B' list must qualify as Minimum Desirable Economic Units (MDEUs). The criteria for MDEUs, which were adopted by the Board of Supervisors, required a 40 acre minimum parcel size for land containing mixed evergreen vegetation and a 20 acre minimum if coverage was 100 percent conifers. In addition, improved parcels needed to meet the 40 acre minimum parcel size while unimproved parcels needed to meet MDEU and 20 acres in size.

In addition to adopting an 'A' list, for which no timberland qualified in Santa Cruz, and a 'B' list of appropriately designated timberland parcels, the TPA required counties to develop criteria for a 'C' list. This was a petitioner's list. "Owners of timber-bearing parcels, who were not notified by the Assessor that they were on the 'B' list could, after November 1, 1977, request inclusion on the 'C' list.

The TPA allows for petitioner rezoning applications to TPZ as long as the parcels meet a set of limited criteria identified in the TPA. The one significant area that is at the discretion of the county is the minimum parcel size for rezoning to TPZ.<sup>5</sup> But even here, the TPA has set the upper limit for that parcel size at 80 acres. (It was originally set at 160 acres, or a quarter-section, but changed to 80 acres in 1982.)

---

<sup>5</sup> Counties can also determine compatible uses.

To summarize, in 1977-78, Santa Cruz County Board of Supervisors made a determination of which parcels qualified to be on the 'B' list and then these were rezoned to TPZ based on a set of six principal factors and MDEU requirements. ALL parcels which qualified were rezoned to TPZ, *except* for approximately 45 parcels contested by the property owners.

The Supervisors also determined that the minimum parcel size in Santa Cruz County for petitioner rezoning applications would be just 5 acres, even though the Supervisors had determined the MDEU to be significantly larger and even though most other counties set the minimum size at 160 acres, the allowable size at that time. The smallest minimum parcel size fore rezoning to TPZ elsewhere appears to be 20 acres in Humboldt County, determined by site class (the quality of the land for growing timber).

### Current Conditions

Currently in Santa Cruz County more than 65,000 acres (over 100 square miles) are in the TPZ zone district. Another 7,800 acres with mapped timber are in parcels larger than 80 acres and as such will not be impacted by any actions regarding minimum parcel size increases. These can be rezoned to TPZ should the owners so desire. Thus, approximately 72,000 acres of timberland in Santa Cruz County are effectively available to apply for timber harvest permits. Additionally, rural landowners can cut trees within 150' of their homes or any other legally permitted structures under fuel hazard reduction Exemptions. These are permits which do not require a review process and are granted as long as they meet the minimal CAL FIRE (CDF) requirements.

Another 22,636 acres have mapped timber and are on parcels less than 80 acres in size and larger than 5 acres. Some of these, undoubtedly, are adjacent to TPZ parcels. No minimum parcel size applies to rezoning contiguous parcels to TPZ as long as they are in the same ownership. The definition of 'contiguous' from the TPA does not even require the parcels to actually be touching, only "adjoining or neighboring or are sufficiently near to each other, as determined by the board or council, that they are manageable as a single forest unit." Therefore, some of this land is also available for logging, should the timberland owners choose to rezone, or should adjacent timberland owners choose to purchase those parcels.<sup>6</sup>

Additionally, the approximately 23,000 acres with mapped timber (remember, these were excluded from the original 1978 TPZ 'B' list) most likely are only partly timbered. All were excluded from rezoning in 1978 because they did not meet MDEU and/or had limiting physical constraints as identified above, unless they were one of the 45 parcels excluded because they were contested by the landowners. Nearly 19,000 acres are in parcels less than 40 acres in size. These would have been reviewed in 1978 and rejected as not meeting the MDEU or having other qualities leading to exclusion from the 'B' list. It is hard to see how those same parcels would now suddenly be viewed in a whole different light. Especially considering the potential impacts to water supplies, roads, and other valuable county resources identified above.

---

<sup>6</sup> Six current rezone applications are being processed by Planning Staff. One application contains contiguous parcels of 14,941 square feet and 1.326 acres. One parcel is completely within the riparian corridor of a tributary to Valencia Creek.

Logging per various parcel sizes

We did a brief data analysis for timber harvest plans approved by CDF from 1996-2005.<sup>7</sup> The acreage figures do not necessarily agree with the APN size, but reflect the size of the timber harvest unit. In many cases the two figures are synonymous. In that ten year period approximately 21,300 acres were approved by CDF for harvest. Only 14 acres were in units 5 acres or less in size. Approximately 1,600 were for units less than 40 acres in size. More than 80% were on parcels over 80 acres in size.

Thus, during that time period the bulk of timber harvesting occurred on parcels greater than 80 acres and nearly all on parcels greater than 40 acres in size. Raising the minimum parcel size to 40 acres could help to reduce conflicts in urbanized mountain neighborhoods, plus protect water quality, challenged local fish populations and county roads, without producing an undue burden on the local timber industry. Raising the bar to 80 acres would allow the County to exercise its zoning authority to the greatest extent allowed by law and still allow for significant timber harvesting in the county.

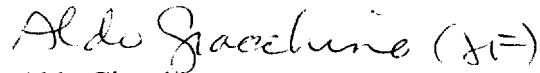
While we said in our opening comments that we urge your Board to adopt 80 acres as the minimum parcel size for rezoning to TPZ, in no circumstance do we believe the minimum parcel size should be set at less than 40 acres.

We hope you will seriously consider our comments.

Thank you for the opportunity to share our views,



Jodi Frediani  
Chair, Forestry Task Force

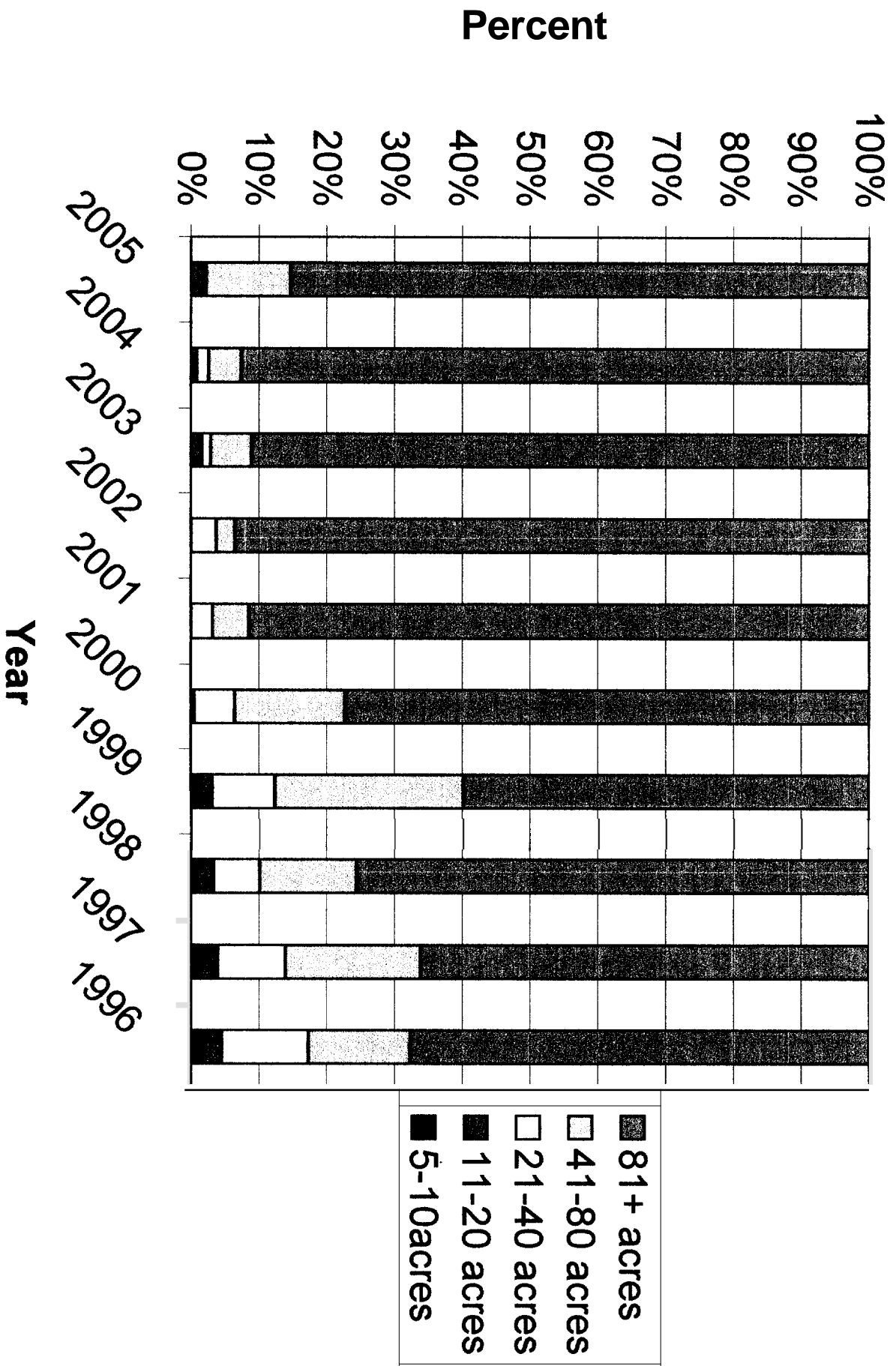


Aldo Giacchino  
Chair, Executive Committee

---

<sup>7</sup> These numbers come from CDF Felton files.

# THP acres by Size, Percentages



### TH Acres by Size per Year

	5-10acres	11-20 acres	21-40 acres	41-80 acres	81+ acres	TOTAL
2005	0	30	0	170	1168	1308
2004	0	17	35	97	1874	2023
2003	0	45	34	167	2519	2765
2002	0	0	0	50	1083	1799
2001	0	0	87	148	2542	2777
2000	7	0	91	250	1188	1536
1999	20	27	139	419	903	1508
1998	25	0	188	390	2099	2775
1997	29	50	201	403	1337	2020
1996	50	74	349	413	1800	2746

**TOTAL**      **131**      **310**      **1490**      **2513**      **07173**      **21317**  
**% of total**      **0.6**      **1.1**      **5.5**      **11.8**      **80.5**      **99.9**

Data from CDF Felton

p. 1 of 2

**The Valley Women's Club**  
**PO Box 574**  
**Ben Lomond, CA 95005**  
**831/338-1728**

**April 18, 2007**

Supervisor Jan Beautz  
**FAX: 454-3262**

Dear Supervisor Beautz,

The Valley Women's Club strongly supports the highest minimum acreage allowable under State law for permitting property owners ~~to~~ rezone into Timber Production Zoning; 20 acres falls far short ~~of~~ protecting our neighborhoods. The enormous changes in logging regulation since the current 5 acre minimum was established demonstrate the need for an 80 acre minimum. The County's influence over the important land use issue of timber harvests has been gutted by a State-mandated system which does little to protect the watersheds and its residents from the negative impacts which accompany timber harvests. The current system even allows harvests in inappropriate areas (like the headwaters of Lompico Creek), forcing those impacted into costly, time-consuming and usually unsuccessful appeals, and even lawsuits, in order to protect their homes or the steep erosive hillsides, fragile waterways, endangered species and their very water supply.

When the 5 acre minimum was set decades ago, Santa Cruz County had its own Timber Harvest Ordinance with important watershed protections governing whether or not logging could take place and what mitigations could be imposed. The County had done extensive research to develop the criteria for what should be considered Timber *Protection Zone* (TPZ) parcels; note the name is now **Timber Production Zone** (TPZ). At the time zoning to TPZ was limited to parcels fitting the defined criteria (including topography, vegetation and access). For some it was seen as a possible way for landowners, hoping to protect their property from housing development, to reduce the cost of ownership and keep the open space by seeking TPZ status - hence the tiny acreage amount. Even *so* the restrictions on rezoning were taken seriously and lands not designated by the County under these thoughtful criteria would not be ~~so~~ zoned. The State criteria now in force do not even demand that the vegetation be trees; it only refers to "wood fiber," leaving it wide open.

Now Santa Cruz County ~~no~~ longer has any say in how timber harvests are conducted and has only limited capability - gained through a very

expensive lawsuit - to control *where* timber harvests may take place. To honor the intent of ~~the~~ lawsuit the highest environmental protection should be implemented.

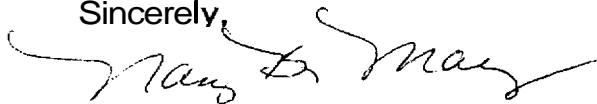
It is perfectly reasonable to set the number of acres to a size which will actually succeed ~~in~~ buffering existing homes and neighborhoods from the impacts of logging, and which will reduce degradation of soils, loss of habitat and destruction of waterways which invariably accompany harvests and which **would** be compounded with smaller parcels being harvested.

The Board of Supervisors has the discretion to set different acreages dependent upon "timber site class" - basically the type of tree - and this apparently has not even been considered ~~by~~ staff.

We strongly urge you to read and consider the carefully elucidated information in the letters from the Lompico Watershed Conservancy and the Sierra Club. They give powerful reasons to set the minimum acres far higher than the 20 acres recommended by staff. The research shows that timber harvests have caused significant damage to the watershed and our water sources, and that harvesting is taking place faster than the trees can grow back. The larger acreage will help curtail both of these problems while helping buffer neighborhoods from the hazards and hassles of commercial timber harvesting.

Thank you for looking to the future and working to protect the watersheds of Santa Cruz County.

Sincerely,



Nancy B. Macy, Chair  
Environmental Committee for the SLV



April 18, 2007

Board of Supervisors  
Santa Cruz County  
701 Ocean Street  
Santa Cruz, CA 95062

Subject: TP (Timber Production Zone) rezoning eligibility criterion

The Lompico Watershed Conservancy recommends that the Board of Supervisors select **80** acres as the minimum eligible parcel size for rezoning into the TP zoning designation.

There are currently over 65,000 acres of land zoned TP in this County. That is over 100 square miles, or nearly **1/4** of the **445** sq. mi. total geographic area of the County. If 80 acres is selected as the minimum parcel size to rezone, that number rises to a potential of 72,850 acres. This should be enough land for local logging companies if they were not over-cutting their lands and those of private TP landowners. The average size of saw logs from this County has fallen in recent years as the volume of the standing log inventory on commercial TP lands has fallen. This is the result of a rate of cut which is higher than the rate of growth. The claims of "sustainability" made constantly by Timber Interests are simply not true.

It has been over 6 years since the Big Creek lawsuit started. Any landowner with at least 5 acres who wanted to rezone into TP could have done so during that time at a cost reduction. They have waited until now to rezone in order to see if they could entirely avoid the County administrative costs of rezoning, hoping that Big Creek did not lose its lawsuit. No one has had any rights denied despite what you will hear on April 24<sup>th</sup>.

The County has only one consideration and authority left exclusively to it. That is the acreage size eligibility to rezone land into **TP**. This issue impacts everyone in the County because of its affect on rural lands conservation, water resource protection, and the future quality of life in Santa Cruz County. It is a privilege to live in our beautiful forested mountains. There is no inherent right to exploit every resource beyond its limits.

The fundamental reason for the complex events that led to the County using its zoning authority, was to try to separate residences from logging projects. If the Board does not substantially increase the parcel size for rezoning to TP, these disputes will re-ignite and the entire court process to affirm the County's right to use its zoning authority will have been a waste of public funds.

It is important for the Board to remember that in 1977 the County did a thorough evaluation of timber production zoning and designated TPZ (now TP) parcels using logical criterion. This involved the Timber Industry. That review included the following considerations (from a County document):

1. Vegetation: "Quality, quantity, and distribution of the existing or potential vegetation of the property, especially hardwoods and conifers. Whether or not a parcel meets MDEU (Minimum Desirable Economic Unit) criterion is a major consideration."

2. Topography: "Physical factors which would adversely affect the growing and/or harvesting of timber. Especially significant would be excessively steep slopes, cliffs or riparian corridors which would prohibit the establishment of roads or skid trails, in conformance with the County Timber Harvest Ordinance."

Note: the County no longer has any authority regarding these conditions due to changes in State laws, which relegate the County to a strictly advisory role in logging plan review.

3. Access: as in road construction on excessively steep slopes. (Again the County no longer has any authority over this consideration.)

4. Surrounding Land Uses: "Nearby existing or planned development which would be incompatible with TPZ uses and would adversely affect the growing and harvesting timber (sic)."

**Again, this and water quality protection, were the underlying reasons for the 2 rule package proposals submitted to the Board of Forestry. When these proposals were rejected by the Board of Forestry, the County chose to assert its zoning authority. I personally attended those meetings to support the County's proposals.**

5. Soil Type: i.e. soils which are unproductive for timber or excessively erosive.

6. Environmental Factors: "Special environmental considerations which would adversely affect the parcel's use for growing and harvesting timber. Examples: Highly erodible watershed area, unique wildlife habitats, or important scenic resources on the property."

The considerations enumerated above were *and are* entirely relevant to the appropriateness of using a particular piece of land for timber extraction. Any forestland which was not zoned TPZ in 1977 either did not meet these basic criterion or the landowner did not want their land in TPZ zoning for their own personal reasons.

Another of the County's considerations in 1977 was the potential economic viability of TPZ zoned land. Using criterion from the logging industry itself, the County rejected **from** TPZ zoning parcels not considered economically viable for commercial timber harvest. This consideration did not include logging **AND** development. The County has already begun rezoning into TP, land that has already been developed! This contradicts the fundamental principle behind TP zoning.

The County won the lawsuit filed against it by Big Creek Lumber on the issue of zoning authority. It is now entirely reasonable for the County to exercise its local government powers to restrict **new** timberland rezonings to lands appropriate for this use. 80 acres is a common size for TP lands across California (see attachments). Prior to 1988, 160 acres was the legal standard.

This county already has the highest amount of interface between commercial timberland and residences.

The Timber Land Productivity Act defines timber land as "privately owned land, or land acquired for state forest purposes, which is devoted to and used for growing and harvesting timber, or for growing and harvesting timber and compatible uses, and which is capable of growing an average annual volume of wood fiber of at least 15 cubic feet per acre." The County is already assigning to parcels dual zonings (such as CA/TP) and dual taxation rates. Only that land area on the subject parcel that is actually forest should be counted as timber land for the purpose of determining acreage eligibility. Areas of the parcel that are used for homes, parking, lawns and other purposes are not timber land.

The illusion is maintained by Big Creek Lumber that CDF uses environmental factors to evaluate the legitimacy of a logging plan, but this is public relations not fact. Fact: virtually any properly written logging plan submitted to CDF will be approved if it has log-hauling access. Concerns related to water pollution, salmon and other endangered species, landslides and hillslope instability, roads and skid trails that do not meet CDF standards, and harassment of neighboring property owners, including damage to their private roads, are all considered as matters to be mitigated or sidestepped. Fact: You can log old growth redwood here in Santa Cruz County ***even in endangered species habitat***. Fact: The Regional Water Quality Control Board's water quality review **of** THPs is usually an empty exercise unless extensive and outrageous violations occur, as did recently on Mt. Madonna on the St. Francis Youth Center THP (the County DA is currently considering the filing of charges).

Big Creek Lumber makes assertions about the amount of land that would theoretically be taken out of timber production if the County limits TP rezoning acreage, however this numbers game presumes that every property owner in the County with trees on their land, is a potential client of Big Creek. Many of these landowners have no interest in commercial logging. Their lands are not available to Big Creek or to any other logging interest, so the presumption of thousands of acres of land being put off limits to logging is an artificial assumption. If all this land ***were*** commercially logged, it would set off an environmental and social disruption of major proportions.

Much verbiage in the Timberland Productivity Act and in other laws and ordinances uses the term "compatible uses". The assumptions in the Act about watershed management and wildlife management as compatible uses with logging are misleading. This is especially true the smaller in area the TP zoned parcel gets. Timber harvest haul roads and tractor skid trails are major sediment sources for Santa Cruz County streams, many of which are listed as "impaired for sediment" by the State Water Resources Control Board and the Central Coast Regional Water Quality Control Board. The **San** Vincente Creek watershed, which serves the community of Davenport, has had its entire forested area logged at least once or twice during the last 20 years. The County is unable to supply Davenport with safe drinking water and the stream was listed for sediment ***from timber harvests*** in the last round of State designated CWA section 303(d) impaired water quality listings. Listing does very little to correct problems and can be a "pro-forma" exercise, appearing to act on the intent of the law rather than to begin an actual path to restoration.

The smaller a logging zoned parcel becomes, the higher the overall logging road density gets on a landscape-wide scale. If the current ridiculous 5 acre minimum for rezoning to TP (by far the lowest standard in the entire State of California) were to remain in place, the road density for log truck access to these small parcels could permanently destroy water quality through erosion off these dirt roads and skid trails in our steep mountain terrain.

I am not persuaded by the threat the Timber Industry has made for many years to convert land out of TP into subdivision and development if they don't have their way on some regulation rule change or other. What we actually often see is logging and then home site development. The largest forestland owner in the State, Sierra Pacific Industries, has recently filed to rezone **23,000** acres of forestland in **3** counties out of TPZ, presumably to sell and subdivide. Sierra Pacific Industries uses clearcut and burn logging practice, so this action to get out of TPZ was not a response to onerous regulations! In some ways TP (or TPZ) zoning can be viewed as a "land bank" for future development. It will be up to the State and the counties to control this risk.

This is a chart from County Staff analysis as part of the County Justification Packet supporting rule change proposals to the Board of Forestry in **1998**. This chart shows the outcome of individual THPs from **1987** to **1993**. The connection between logging and development is obvious.

Year	Rural Density Matrix	Development Permits	Violations	Ownership Transfers
<b>1987</b>	11%	<b>39%</b>	<b>28%</b>	<b>56%</b>
<b>1988</b>	22%	<b>58%</b>	41%	<b>63%</b>
<b>1989</b>	13%	<b>38%</b>	<b>4%</b>	<b>42%</b>
<b>1990</b>	20%	<b>35%</b>	<b>33%</b>	<b>35%</b>
<b>1991</b>	19%	<b>38%</b>	31%	<b>25%</b>
<b>1992</b>	8%	<b>25%</b>	<b>46%</b>	<b>33%</b>
<b>1993</b>	16%	<b>34%</b>	<b>38%</b>	<b>19%</b>
average	<b>16%</b>	<b>38%</b>	<b>32%</b>	<b>39%</b>

It is clear that a lot of logging plans were followed by development as this is the fastest way to completely financially (and physically) exploit a piece of forest land. Only the recent requirement to be in a specific zone district to log has slowed this nasty process. The County's current subdivision rules for TPZ are too liberal and can allow up to **8** houses on an **80** acre parcel outside the Coastal Zone. This would be an extreme case because terrain restraints usually make this amount of construction impossible, but these rules are on the books. The point is that we often get logging *and* homebuilding, and the rate of this type of land exploitation could explode if the acreage eligibility for rezoning into TP is not increased substantially to 80 acres. At least TP is subject to some subdivision restrictions.

Note: Categories **3** and **4** were shown as "rough" perhaps because development permits are not necessarily approved, and CDF violations are often revoked upon "correction" etc.

Source water protection is probably the most important resource and economic function that the County's forestlands provide to everyone in Santa Cruz County. All the household water in Santa Cruz County comes from our forestlands. Imagine if we had to get our water from other

"harvested" lands used for agricultural row crops! If effective limits are not placed and enforced on logging and development, the water resources of this County will be even further degraded. Home sites, access roads and driveways can be, and often are, major sources of soil erosion along with commercial logging, however home site and driveway conditions are subject to County authority. I have recently expressed my concern about the lack of County enforcement of its codes for these land uses to the Board of Supervisors. Little has changed but at least these matters are under the County's authority *if* it were to act more effectively to protect our critical water resources.

The Lompico Watershed Conservancy has devoted a lot of its efforts to water resource protection. I reviewed the "Watershed Sanitary Survey for the San Lorenzo Valley and North Coast Watersheds, March 2007" Balance Hydrologics; prepared for the City of Santa Cruz Water, San Lorenzo Valley Water District and the Lompico County Water District. Here is some pertinent information from that report.

Excerpts as follows:

"The average timber harvest size in the San Lorenzo Valley from 2001 to 2006 was 106 acres" [appendix C]

"During the past decade, both the San Lorenzo Valley Water District and the City of Santa Cruz have stopped timber harvesting, managing their watersheds for the yield of water and for open-space uses. Concurrently, SLVWD and Lompico Water Districts have been cooperating in several different ways with Sempervirens Fund and other conservation groups to limit harvesting in their water-supply watersheds. Major cessations of harvesting have occurred or are in the process of occurring through this cooperative set of efforts in the SLVWD watershed lands on the east slope of Ben Lomond Mountain, in the upper San Lorenzo watershed, and in the upper Lompico watersheds." [sec. 2 page 10]

"Timber harvests occur throughout the surveyed watersheds, but primarily in the San Lorenzo Valley. Virtually all portions of this watershed are affected. A compilation of permitted timber harvests in the San Lorenzo Valley (Appendix C) developed by SLVWD staff shows that 4,554 acres of the 71,900 acres in the watershed-or about **6.4%** - were likely harvested commercially during the six years of 2001 through 2006. This is equivalent to about 10 percent of the watershed, allowing for watershed lands or parks from which harvesting is excluded." sec.3.11

"Timber harvesting is responsible primarily for the contribution of additional sediment through erosion from logging roads. With sediment, nutrients and bacteria are also introduced into the streams. The relationship between timber harvesting and sediment yield is poorly defined and related to specific site conditions including geology, slope, and stream proximity as well as specific timber harvesting practices. Limited local studies have been conducted to measure effects of erosion from timber harvesting roads. One field-based study in

the Zayante, Newell, and Love Creek watersheds (Swanson and Dvorsky, 2001), suggests that roads related to timber entry (past and present) are sources for perhaps 30 to 50 percent of sediment delivered to the creek system, with values differing substantially by (a) subwatershed, (b) sandy vs. non-sandy soils, and (c) inner gorge versus hillslope location.” sec 3.1.1.1.

It is not in the public interest **to** rezone land parcels smaller than 80 acres and into Timber Production. It is beyond ridiculous to even consider a size below 40 acres. This is the smallest size in the State for the CDF “timber site class” of trees that grow here. There is not going to be an explosion of development on these lots because they are too steep to subdivide. This is one of the reasons they erode *so* badly after they are logged. Over a decade of work as gone into getting a resolution to this problem. Santa Cruz is not some “hard bitten” Oregon logging town ruled by its logging companies, *or is* it? It has a very diverse economy with very high real estate prices. The median home price in Santa Cruz County was \$635,000 last July. We have a very serious water supply shortage. Seawater desalinization plants are in the process of getting built here because we simply do not have the water resources for our current population let alone any future increases.

Is this the place where we log every last acre **of** private forest land? We should be letting current non-TP zoned forest land simply stand quietly and continue to supply us with pristine water and the wildlife so many of us claim to care about. It doesn’t work both ways.

Regards,

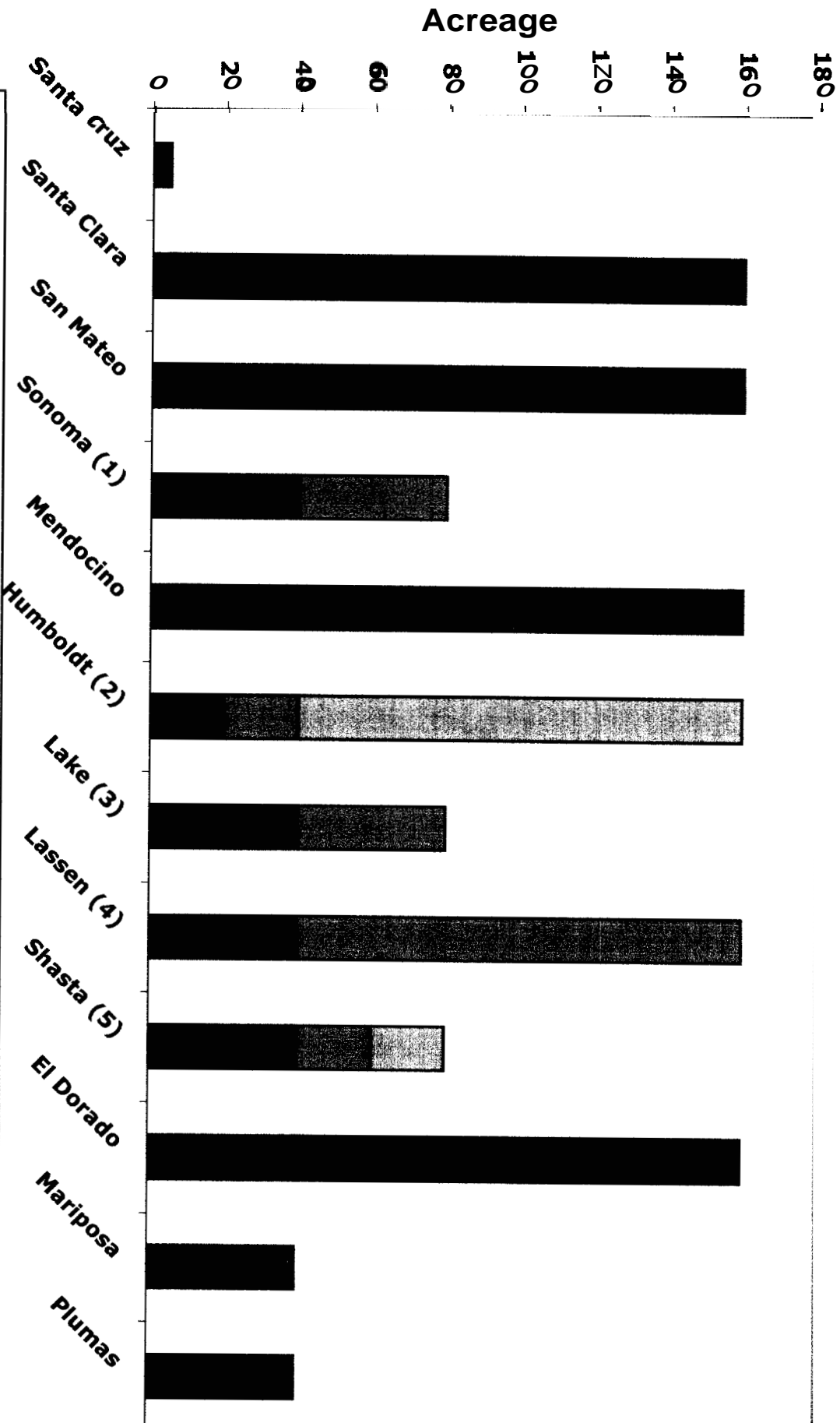


Kevin Collins

Attachments:

1. Excel bar graph of comparative CA County TPZ acreage
2. Survey **of** California County Rules for Timber Production Zoning Policy

## Comparative Timber Zoning Acreage of California Counties



**Notes:**

Above Counties have one zoning acreage, except as noted below and indicated by bar color change.

(1) Sonoma - Site Class I and II minimum 40 acres. Site Class III to IV minimum 80 acres.

(2) Humboldt - Generally 160 acres, except allows Site Class I and II minimum 20 acres, Site Class III minimum 40 acres.

(3) Lake - Generally 80 acre, except if contiguous parcel and Site Class I and II, may be 40 acres.

(4) Lassen - 160 acres, or 40 acres if contiguous with a 160 acre TPZ parcel.

(5) Shasta - Site Class I minimum 40 acres. Site Class II minimum 60 acres. Site Class III to IV minimum 80 acres.

## Survey of California County Rules **for** Timber Production Zoning Policy

Prepared by Kevin Collins for the Lompico Watershed Conservancy and the Santa Cruz Group of the Ventana Chapter of the Sierra Club. Date of preliminary completion, January 29, 2007,

Lompico Watershed Conservancy  
P.O. Box 99  
Felton, CA 95018  
831-335-8135  
<bats3@cruzio.com>

Limitations: This document is compiled from County Code and **County** General Plans available from internet searches as well as phone contact with Planning Departments. Generally speaking larger counties and counties with more sophisticated internal systems are more likely to have their documents available on the web. The counties in this survey were surveyed during January 2007. This survey does not cover every CA county with timber resources, but it does include all of the coast from Santa Cruz north, Lake and parts of the Sierra Nevada, and parts of the Trinity Klamath area. County selection in these areas was generally random. In some instances such as that of Del Norte County the county may have no apparent timber **zoning** actions or policy of its own other than to have complied with the Timber Productivity Act of 1976 which segmented timber zoning from Williamson Act agricultural zoning. Any analysis of county code is preliminary at this time, and is not intended to be inclusive. Notes pertinent to issues of zoning acreage, Timber Management Plan requirements and specific individual county requirements are listed at the top of each county reference. Due to time constraints these notes should not be considered to be complete at time of printing.

Excerpts of code and general plan language are included. Some document formatting is irregular due to the "paste" from Acrobat PDF into Word.

### **Southern Coast District**

The three Counties in the CDF Southern Coastal Sub-District with **Santa Cruz** are San Mateo and Santa Clara. Santa Clara has low levels of logging activity. Santa Cruz County has **the** most.

### **Santa Clara County**

Notes: Overlapping rules apply to "Rural Base Districts" including AR (Agricultural Research and HS (Hillside)

Timber Production as a specific use is **only** addressed under HS zoning but may take place in A1 and AR. (Answer contingent on phone contact with Santa Clara Planning Dept staff). Interestingly TPZ as a zone district did not appear in the **Santa** Clara zoning code.

County language following below:

Zoning for Timber Production in HS with an acreage size of 160 acres. Subdivision subject to specific limitations listed below.

HS Hillside. The purpose of the Hillside district, also known as the HS district, is to preserve mountainous lands unplanned or unsuited for urban development primarily in open space and to promote those uses which support and enhance a rural character, which protect and promote wise use of natural resources, and which avoid the risks imposed by natural hazards found in these areas. These lands are watersheds and may also provide such important resources as minerals, forests, animal habitat, rare or locally unique plant and animal communities, historic and archeological sites, scenic beauty, grazing lands, and recreational areas. Additionally, lands zoned Hillside define the setting or watershed for the urban area of the county.

§ **2.20.070HS** Districts: Supplemental Development Standards  
§ 2.20.070 C.

Special HS Subdivision Regulations. A cluster permit is required for subdivision of land into lots of less than 160 acres within the HS zoning district, except as specified for a two-lot subdivision below. The following provisions apply only to the subdivision of land in the HS district. Provisions for application of the 20-160 acre slope density formula are provided in §2.20.040, Slope Density Requirements.

2. A cluster permit is required for the division of land into lots of less than 160 acres, except as specified above (subsection **2.20.070(B)(1)**). A cluster arrangement of residential home sites shall achieve economy of land use and efficiency of access, while avoiding or minimizing impact to the natural environment to the extent feasible. Defined development areas shall include no more than 10% of the total land area subject to the land division, with at least 90% of the remaining land area preserved in permanent open space by means of dedication of development rights which prevents future subdivision of such lands. Cluster development proposals may be arranged in more than one cluster provided that the multiple cluster arrangement achieves economy of land use and efficiency of access intended by this ordinance and the applicable provisions of the Hillside general plan land use designation.

Note: Applications for **any** subdivision in rural zones are subject to a “slope density” calculation of land slope to acreage.

## San Mateo County

Notes: Timber Preserve-Coastal Zone (2 zones) 160 acres minimum. Subdivision is conditional on numerous criterion listed below. Criterion for a Timber Management Plan is very specifically defined in much more detail than in the State TPA.

County language follows below:

### 37A.2

**SECTION 6957. LAND DIVISION WITHIN THE TPZ-CZ. Legal parcels zoned as**

Timberland Preserve-CoastalZone shall not be divided into parcels containing less than 160 acres unless all the owners of resulting legal parcels (a) submit a joint timber management plan as described in Section 6976 prepared or approved as to content by a registered professional forester; and (b) such owners enter into a binding contract with the Board of Supervisors to manage and harvest timber on all the timberland jointly, and are bound by the provisions of such management plan for a minimum period of 30 years. Such division shall be approved by 4/5 vote of the full Board.

SECTION 6958. REZONING. Rezoning from TPZ-CZ may be initiated by the landowner or the County.

## CHAPTER 37B. LAND MANAGEMENT PLANNING REQUIREMENTS FOR USES AND PERMITS IN THE TIMBERLAND PRESERVE ZONE

SECTION 6963. USES AND PERMITS. Timber growing and harvesting and compatible uses only are permitted in the TPZ-CZ. A proposed use which the Planning Director determines to be a compatible use and which does not constitute development as defined in Section 6953.3 shall not require a permit. Permits shall be required for all developments.

SECTION 6964. COMMERCIAL TIMBER HARVESTING is permitted in the TPZ-CZ under the Timber Harvesting Ordinance, Division VIII, Part I, Regulation of Timber Harvesting, Section 10,000 through 10,807 inclusive.

SECTION 6965. COMPATIBLE USE DEVELOPMENT REQUIREMENTS. All developments proposed for location within the Timberland Preserve/Coastal Zone shall meet the definition of compatible use set forth in Section 6953.1. Such developments, except commercial timber harvesting, shall require issuance of either a Minor Development Permit or a Major Development Permit. All developments require a Timber Management Plan (Section 6976) with sufficient details to achieve the purposes of this ordinance.

SECTION 6966. APPLICATION PROCEDURES AND CRITERIA for deciding between alternative development permit procedures.

1. The applicant shall submit a completed TPZ-CZ application, and a Project Description and Environmental Certification form briefly describing the proposed development.
2. The applicant shall submit a Timber Management Plan with sufficient detail to guide and coordinate the development.
3. If, after review of material submitted in 1. and 2. above, the proposed use is a compatible use allowed in the TPZ-CZ, is either listed or determined by the Planning Director to be a minor development, and is adequately coordinated by the Timber Management Plan, the Planning Director may approve a Minor

Development Permit without the requirement of a public hearing.

4. If, after a review of the material submitted in 1. and 2. above, the proposed use is a compatible use permitted in the TPZ-CZ, but cannot qualify as a minor development, the application is declared to be major development and shall be reviewed according to the Major Development Permit procedures as required under Section 6969 below.

5. If, after review of the material submitted in 1. and 2. above, the Planning Director determines that the proposed use is not a compatible use as defined in Section 6953.1, he shall notify the applicant in writing and state the reasons.

SECTION 6967. MINOR DEVELOPMENT PROCEDURES. Minor development is any development which, following examination of environmental information, is qualified for a negative declaration or categorical exemption. Such development may be declared a minor development by the Planning Director. Minor developments may include, but are not limited to, the following uses:

1. Agricultural and recreational animal uses and their accessory structures including fences;
2. Single-family dwellings and their accessory structures including parking areas, driveways, and minor roadways;
3. On-site manufacture and/or sale of minor quantities of manufactured products; defined as up to 100,000 board feet, or equivalent measure, during any 12 consecutive month period;
4. Limited trailer housing, for laborer or a watchman, for not more than 9 months in any one year;
5. Development and maintenance of gas, electric, water, or communications transmission facilities;
6. Stables;
7. On-premise signs;
8. Campgrounds, and overnight recreation shelters;
9. Any other use determined by the Planning Director to be a minor development which is consistent with the purposes of this ordinance, a compatible use, and which will not impair the present or potential uses of adjacent properties.

SECTION 6968. MINOR DEVELOPMENT PERMIT. In order for the Planning Director to issue a Minor Development Permit, the Director must declare the following requirements have been met:

1. A complete TPZ-CZ application and Project Description and Environmental Certification form have been submitted.
2. Any additional information has been submitted that the Director believes is necessary in order to evaluate adequately the impact of a development.
3. A negative declaration or a categorical exemption has been issued.
4. The proposed minor development meets all applicable design criteria contained in Section 6973 below.
5. The proposed minor development has an adequate Timber Management Plan that assures the project is consistent with the purposes of the TPZ-CZ and will

not impair the present or potential uses of adjacent properties.

Appeal of the issuance or non-issuance of a minor development permit, or any condition thereof, may be made by the applicant or any other person pursuant to Section 6980.

SECTION 6969. MAJOR DEVELOPMENT PERMIT. A major development in this chapter is any development that is permitted in the TPZ-CZ other than commercial timber harvesting or a minor development.

1. A proposed major development shall require a Development and Timber Management Plan pursuant to Section 6970.

2. The Planning Commission shall determine whether a major development is compatible with the TPZ-CZ, or whether rezoning is required in order to allow the proposed use.

SECTION 6970. DEVELOPMENT AND TIMBER MANAGEMENT ("DTM") PLAN PROCESS AND REQUIREMENTS. A Development and Timber Management Plan shall be prepared within one year and shall include the following elements:

1. An environmental document as required under CEQA regulations. Any environmental analysis shall include:

- a. A brief description of the timber stand age and structure.
- b. Site topography.
- c. Geology.
- d. Soil characteristics.
- e. Hydrology.
- f. Climate.
- g. Vegetation.
- h. Wildlife.
- i. Road access.
- j. Cultural and other special features pertinent to the proposed site.

2. A Timber Management Plan (Section 6976).

3. A tabulation of proposed land uses, building types, floor areas, number of dwelling units, usable open space, land coverage, total number of acres in the proposed development, and the percent of area designated for various uses.

4. A description of the proposed development's design theme as it applies to all buildings and landscapes.

5. Elevations, site and schematic floor plans for building types at an appropriate scale as determined by the Planning Director.

6. The precise location of water, sewerage, and drainage facilities, including any utility easements.

7. A landscaping plan showing proposed land forms including walls, walks, fences, screening, and the irrigation system, in addition to the location, size, number and variety of proposed tree or plant materials to be saved or installed, or existing plant materials to be removed or relocated.

8. A development schedule that at least includes anticipated timing, duration and costs, and the anticipated priorities of each development stage, **if any**.

9. The proposed circulation system, including the location of, and the

specifications and improvements for streets, pedestrian pathways, and other circulation facilities.

**10. A** plan for all proposed parking, loading and unloading, as well as service areas.

**11. A** grading or earth moving plan, indicating haul routes and disposal sites if necessary.

**12. A** planned sign program indicating quantity, location, size, and design of all proposed signs.

**13. A** precise lighting plan.

**14. A** copy of proposed private agreements, covenants or restrictions, which govern the use, maintenance, and continuing operation of the development and any of its common areas, facilities, and services that proposed private agreements, covenants or restrictions, shall provide that payment of assessments to support the continued maintenance and operation of the development; any of its common areas, facilities and services shall be secured by a deed of trust on the property for the benefit of the County as well as for the benefit of any homeowners' association.

**15. A** Master Land Division Plan ("MLDP") which delineates how the parcel will be ultimately divided according to the maximum density of development permitted - and consistent with the findings and conclusions of the environmental document (Section 6970.1). The MLDP shall indicate:

- a. All existing and new property lines.
- b. Proposed uses for each parcel.
- c. Location of roads providing access to each parcel and road improvements required.

Parcels shall:

- a. Be of sufficient size to meet minimum domestic well water and on-site sewage disposal area requirements, except for the latter where it is legally possible to connect to water district lines.
- b. Be clustered in order to have the minimum amount of stream frontage.
- c. To the extent feasible, minimize the number of roads and driveways directly accessing major roads.

An MLDP shall permit division in phases, and all future divisions occurring on the original parcel for which an MLDP has been filed shall conform to that MLDP, or an approved amendment thereto. An MLDP shall not be required if a deed restriction, or other legally enforceable instrument, limits development rights to a total potential buildout of four (4) or fewer dwelling units on the whole parcel.

The Development and Timber Management Plan shall be sufficiently detailed to indicate fully the ultimate operation and appearance of the development. Should the proposed development involve a subdivision, appropriate application will be made concurrently according to existing regulations.

Within 50 days of receipt of a **DTM** Plan, the Planning Director shall review it, refer it for analysis and recommendation to all interested persons and agencies,

prepare a final report for the Planning Commission's consideration, and schedule a legal public hearing, following established policies.

**SECTION 6971. PLANNING COMMISSION ACTION AND FINDINGS** on the Development and Timber Management Plan. Upon public hearing of the Plan, the Planning Commission shall take one of the following actions on the application: (1) approve, as submitted, (2) approve, subject to conditions of approval, or (3) deny.

1. Approval - If the Planning Commission finds that the DTM Plan conforms with all applicable criteria, standards and policies, and makes the specific findings listed below, it may approve the plan. The specific plan findings are that:

a. The DTM Plan is in harmony with the County General Plan and the purposes of the TPZ-CZ, and can be coordinated with existing and proposed development of surrounding areas.

b. Any proposed residential development will constitute a residential environment of sustained desirability and stability; it will be in harmony with the character of the surrounding area; and the public facilities, such as schools, playgrounds and open space, are adequate to serve the anticipated population and are acceptable to the public authorities having jurisdiction.

c. Any proposed compatible commercial, institutional, recreational, and other non-residential uses will be appropriate in size, location and overall planning to the purpose intended; such development will be in harmony with the character of the surrounding areas.

2. Approve with Conditions - In approving the DTM Plan, the Planning Commission

may attach reasonable conditions of approval: **(1)** to ensure public safety, health, and welfare; **(2)** to support the required findings; or **(3)** to ensure compliance with the content and purpose of this ordinance. Conditions of approval may include, but not be limited to, design modifications, site improvements, exactions, and supplemental information.

3. Denial - If the Planning Commission finds that the DTM Plan does not meet all applicable criteria, standards and policies, it may deny the plan, giving its reasons. The Planning Commission may grant the applicant the opportunity to amend the DTM Plan and reschedule another legal public hearing within six months.

The Planning Commission decision shall become effective ten (10) days after the decision is rendered, providing an appeal is not filed in accordance with the provisions of Section 6780.

**SECTION 6972. DEVELOPMENT DESIGN CRITERIA.** Any development shall consider several general and specific design criteria when applicable. The design criteria are outlined as follows:

**SECTION 6973. GENERAL DESIGN CRITERIA.**

1. Environmental Design Criteria. All developments shall be designed to

conserve energy; to minimize air pollutants to meet County, State and Federal standards; to exclude significant levels of noxious odors; to use only biocides having no significant adverse environmental effects and to avoid discharging other chemicals which unbalance the major ecosystems; to exclude long-term noise levels; to avoid extensive change of vegetation; and to avoid adverse impacts on wildlife habitat, to minimize impacts on perennial streams and riparian habitat.

2. Site and Building Design Criteria. All developments shall:

- a. Be property sited to be subordinate to and compatible with their surroundings.
- b. Fit structures with the topography without undue grading or change to existing land forms.
- c. Develop parking in small, screened lots.
- d. Minimize design and construction impacts on adjacent property owners due to blocked views, noises, lights, glare and odors.
- e. Maintain soil stability on and off site.
- f. Keep the profile of all structures less than the forest canopy height.
- g. Use materials and colors that blend with surroundings.
- h. Minimize increase in fire risk and hazard.
- i. Minimize vegetation and tree removal.

3. Utility Design Criteria. All developments shall:

- a. Be designed to minimize the bulk and appearance of utility structures, poles, overhead wires, and signs.
- b. Locate all utility lines underground where practicable; and use existing or locally available public water supply sources.
- c. Have access to a satisfactory public sewer system nearby or to be suitable for septic tank installation, or other approved facility.

4. Cultural Resources Design Criteria. All developments shall be designed to avoid and maintain known archeological sites. Any unknown sites found during construction of a development shall be cause to suspend all work until approval to continue is obtained from the Planning Director.

5. Public Safety Design Criteria. All developments shall:

- a. Be designed to provide setbacks from hazardous areas.
- b. Avoid off-site damage to life and property.
- c. Avoid construction of any structures on hazardous areas as defined in the County's General Plan.
- d. Avoid use of any portion of any land which is unsuitable for use for reasons of exposure to fire, flooding, inadequate drainage, soil and rock formations with severe limitations for development, or steep slopes.
- e. Avoid use of land with inadequate water supply or sewage disposal capabilities, or any other features harmful to the health, safety or welfare of the future residents or property owners of the proposed development or the community-at-large.

SECTION 6974. PRIMARY RESOURCE AREA DESIGN CRITERIA. These supplementary review criteria shall apply to developments that fall within Primary

Resource Areas. These criteria are in addition to all other development criteria.

1. Scenic Corridors and Other Scenic Resource Areas Design Criteria. All developments shall:
  - a. Be designed to protect and enhance public views within a scenic corridor defined in the Visual Quality Chapter of the County's General Plan.
  - b. Visually screen access roads and parking areas from scenic corridors.
  - c. Minimize the number of access roads to scenic corridors.
  - d. Minimize the visual impact on scenic corridors.
  - e. Prohibit any use of a designated primary landscape feature.
  - f. Use native vegetation and earth berms as fencing material when screening is required.
2. Fish and Wildlife Habitat Areas Design Criteria. All developments shall:
  - a. Be designed to prevent reduction or removal of habitat areas.
  - b. Insure that any spawning and nesting areas or wetlands are not developed, altered, filled or dredged.
3. Forest Resources Design Criteria. All developments shall be designed to minimize the use of Site I, II or III soils for any use other than growing and harvesting of timber.
4. Water Resources Design Criteria. All developments shall:
  - a. Be designed to maintain groundwater basins.
  - b. Not disrupt groundwater recharge.
  - c. Manage flows to maintain fish habitats.
  - d. Maintain the quality of water in any water body or source.
  - e. Avoid construction of structures and roads directly adjacent to lakes or reservoirs over 5 acres in size.
5. Mineral Resource Areas Design Criteria. All developments shall:
  - a. Be designed to enhance, reuse, and rehabilitate mineral resource land areas.
  - b. Minimize impacts to surrounding scenic and open space amenities.
  - c. Minimize impacts on water and wildlife resources.

SECTION 6975. SPECIAL HAZARD AREAS DESIGN CRITERIA. These supplemental design criteria shall apply to developments that fall within the Special Hazard Areas as defined in the County's General Plan.

1. Flood Plan Hazard Area Design Criteria. All developments within a 100-year floodplain shall:
  - a. Be designed to maintain water quality.
  - b. Avoid construction of flood control works.
  - c. Reduce flood damage potential.
  - d. Be above the 100-year flood elevation for any given area, including the location of service facilities and utilities.
  - e. Provide storm drain facilities to store and convey water without damage to persons or property.
  - f. Avoid installations of sewage disposal facilities requiring soil absorption systems.

- g. Avoid location of all water systems not flood proofed at or above the flood protection elevation.
- 2. Seismic Hazard Area Design Criteria. In all areas defined as hazard areas in the Natural Hazards Chapter of the San Mateo County General Plan, all developments shall be designed to standards which achieve the following:
  - a. Maintenance of the health, safety and welfare of County residents.
  - b. Compliance with the requirements of the County General Plan.
  - c. Consistency with the uses proposed.
  - d. Minimal likelihood of direct damage to the uses, and minimal indirect threat to public health and safety in the event of a major seismic event.
- 3. Slope Instability Hazard Area Design Criteria. Within all areas proven as highly unstable by a geotechnical report, development shall be designed to standards that have been demonstrated and will not contribute to the instability of the land. All structural proposals shall adequately compensate for soils and other subsurface conditions.

**SECTION 6976. TIMBER MANAGEMENT (“TM”) PLAN.** A Timber Management (“TM”) Plan is required for all developments. Failure to follow the TM Plan shall be cause for rezoning of the land. The TM Plan shall include the following and any additional information the Planning Director may require to achieve the purposes of this ordinance:

- 1. The Plan shall be sufficiently detailed and specific to achieve the intent and purpose of this ordinance and to coordinate and integrate the uses, and shall be prepared and/or approved by a licensed forester.
- 2. The Plan shall indicate volume, rotation and cutting cycle, vegetation types, other resources, and resource development and utilization.
- 3. The Plan shall show existing and planned road and major skid road locations, and permanent stream crossings; sequence of harvesting, timing of harvesting (if relevant) and method of avoiding conflicts with timber uses. The Planning Director must be notified, and may for reasons, approve minor changes in the Plan. Substantial changes in the rotation, cutting cycle, or uses shall require approval of the Planning Commission.
- 4. The Plan shall include a topographic map with scale of at least one inch equals 1,000 feet (1:12,000) which includes the significant information from the Plan.
- 5. The Plan shall define a reasonable harvest time. This may require growth and cost estimates and financial maturity calculations or estimates, as well as other estimates or other calculations showing that the timing and amount of cutting would be feasible.

**SECTION 6977. MAXIMUM DENSITY OF DEVELOPMENT.** In the TPZ-CZ District, for purposes of determining the maximum total number of density credits accumulated on any parcel, the following system shall be used. The total parcel

shall be compared against the criteria of this section in the order listed. Any segment of a parcel to which a criterion first applies shall be allowed a maximum accumulation of that density. Once considered under a criterion, a segment of the parcel shall not be considered under subsequent criteria. When the applicable criteria have been determined for each of the areas, any portion of the parcel which has not yet been assigned a maximum density accumulation shall be assigned a density of one density credit per **40** acres. The sum of densities accrued under all applicable categories shall constitute the maximum density of development permissible under this section. If the fractional portion of the number of density credits allowed is equal to or greater than .5, the total number of density credits allowed shall be rounded up to the next whole density credit. If the fraction is less than .5, the fractional unit shall be deleted. All legal parcels shall accumulate at least one density credit. Expanded or additional non-agricultural uses shall only be permitted on a parcel when there are enough density credits available to that parcel to meet the density credit requirements of this Section for both (a) existing uses, and (b) any expanded or additional uses, and only where such development meets other applicable policies of the Local Coastal Program. Amount of Development Allowed for Non-Agricultural Uses, Except Visitor-Serving, Commercial Recreation, and Public Recreation Uses. For new or expanded non-agricultural uses, except visitor-serving, commercial recreation, and public recreation uses, one density credit shall be required for each **315** gallons, or fraction thereof, of average daily water use during the two months of highest water use in a year. This requirement applies to water use by or resulting from the non-agricultural use, including landscaping, swimming pools and all other appurtenant uses.

#### Residential Uses

For new or expanded residential uses, a single-family dwelling unit shall be deemed to use **315** gallons of water per day during the two months of highest water use in a year (including landscaping, swimming pools and all other appurtenant uses).

Non-Agricultural Uses Except Visitor-Serving Uses For non-agricultural uses, except visitor-serving uses, the amount of development allowed for each density credit in accordance with the requirements of this policy shall be the amount stated in Table **1.5** in the column headed "Number of Measuring Units Per Density Credit Based on Peak Daily Water Use With Conservation Fixtures." Amount of Development Allowed for Visitor-Serving, Commercial Recreation, and Public Recreation Uses For new or expanded visitor-serving, commercial recreation, and public recreation uses, one density credit shall be required for the first **945** gallons, or fraction thereof, of average daily water use during the two months of highest water use in a year. One additional density credit shall be required for each **630** gallons, or fraction thereof, of average daily water use during the two months of highest water use in a year. This requirement applies to

water use by or resulting from the visitor-serving use, including landscaping, swimming pools and **all** other appurtenant uses. The 945-gallon water use allowance for one density credit may be applied one time only on a parcel. For visitor-serving, commercial recreation, and public recreation uses listed in Table

1.5, the amount of development allowed for each density credit in accordance with the requirements of this policy shall be:

#### First Density Credit

For one density credit or the first density credit when multiple density credits are available, either  $1 \frac{1}{2}$  times the amount stated in Table 1.5 in the column headed "Number of Measuring Units Per Density Credit Based on Peak Daily Water Use With Conservation Fixtures," or the amount stated in that column and a residential dwelling unit associated with a visitor-serving facility that is occupied by the facility owner or operator.

#### Additional Density Credits

For each additional density credit, the amount stated in Table 1.5 in the column headed "Number of Measuring Units Per Density Credit Based on Peak Daily Water Use With Conservation Fixtures."

For the purpose of this provision, "visitor-serving, commercial recreation, and public recreation uses" shall be only those lands and facilities listed in LCP Policies 11.1, 11.2 and 11.3, and only if those lands and facilities specifically enhance public opportunities for coastal recreation. **As** an interim limit, no more than 600 visitor-serving lodging units may be approved in the rural Coastal Zone, as specified by LCP Policy 1.23. The provisions of this section will not apply to farm labor housing, other structures considered to be accessory to agriculture under the same ownership, a residential dwelling unit associated with a visitor-serving facility that is occupied by the facility owner or operator, or density credits transferred in accordance with the provisions established by the Planned Agricultural District Regulations.

#### A. Prime Agricultural Lands

One density credit per 160 acres for that portion of a parcel which is prime agricultural land as defined in Section 6351 (i.e., the number of acres of Prime Agricultural Land divided by 160).

#### B. Lands With Landslide Susceptibility

One density credit per 160 acres for that portion of a parcel which lies within any of the three least stable categories (Categories V, VI and L) as shown on the U.S. Geological Survey Map MF 360, "Landslide Susceptibility in San Mateo County" or its current replacement (i.e., the number of acres of land susceptible to landslides divided by 160).

#### C. Land With Slope 50% or Greater

One density credit per 160 acres for that portion of a parcel which has a slope 50% or greater (i.e., the number of acres of land with a slope 50% or greater divided by 160).

D. Remote Lands One density credit per **160** acres for that portion of a parcel over **1/2** mile from a public road that was an existing, all-weather through public road before the County Local Coastal Program was initially certified in November **1980** (i.e., the number of acres of remote land divided by 160).

E. Land With Slope 30% But Less Than 50% One density credit per 80 acres for that portion of a parcel which has a slope 30% but less than 50% (i.e., the number of acres of land with a slope 30%, but less than 50% divided by 80).

F. Lands Within Rift Zones or Active Faults

One density credit per **80** acres for that portion of a parcel which is located within the rift zone or zone of fractured rock of an active fault as defined by the **U.S.** Geological Survey and mapped on **USGS** Map MF 355, "Active faults, probably active faults, and associated fracture zones in San Mateo County," or its current replacement (i.e., the number of acres of land within rift zones or active faults divided by **80**).

G. Lands Within Flood Hazard Areas

One density credit per 60 acres for that portion of a parcel falling within a 100-year floodplain as most recently defined by the Federal Emergency Management Agency, the **U.S.** Geological Survey, or the **U.S.** Army Corps of Engineers (Le., the number of acres of land within the 100-year floodplain divided by 60).

H. Land With Slope 15% But Less Than 30% One density credit per 60 acres for that portion of a parcel with a slope in excess of 15% but less than 30% (i.e., the number of acres of land with a slope 15%, but less than 30% divided by 60).

I. Land Within Agricultural Preserve or Exclusive Agricultural Districts

One density credit per 60 acres for that portion of a parcel within agricultural preserves or the exclusive Agricultural Districts as defined in the Resource

Conservation Area Density Matrix policy on March 25, **1986** (i.e., the number of acres of land within Agricultural Preserves or Exclusive Agricultural Districts divided by 60).

J. All Other Lands

One density credit per **40** acres for that portion or portions of a parcel not within the above areas (i.e., the number of acres of all other land divided by **40**).

If the same portion of a parcel is covered by two or more of the subsections A. and J., the density credit for that portion shall be calculated solely on the basis of the subsection which permits the least density credit.

**SECTION 6980. APPEALS.** The applicant or any other person, who is aggrieved by the issuance **or** non-issuance of a permit or any conditions thereof may appeal in the following manner. A statement by the appellant shall be required indicating how the appellant is aggrieved or adversely affected by the decision. At the time the appeal is heard, the Planning Commission shall rule upon the appellant's standing as an aggrieved party. If the Planning Commission rules that the appellant is not aggrieved, all further proceedings shall be stayed except that the appellant may appeal the Planning Commission decision on standing to the

Board of Supervisors as herein provided.

1. Permits considered and acted upon by the Planning Director may be appealed to the Planning Commission by filing a written protest with the Secretary of the Planning Commission within ten (10) days of issuance or denial of said permit. The appellant shall state specifically the grounds for appeal, and where there was error or contravention of County policy or how the decision is contrary to the public health, safety, or welfare, or contrary to constitutional or property rights. The Planning Commission shall hear such appeal within thirty (30) days of the date of filing of the written protest. The Planning Commission shall render a decision on the appeal within fifteen (15) days of public hearing.
2. Permits considered and acted upon by the Planning Commission may be appealed to the Board of Supervisors by filing a written protest with the Clerk of the Board of Supervisors within ten (10) days from the decision of the Planning Commission. The appellant shall state specifically the grounds for appeal and where there was an error or contravention of County policy or how the decision is contrary to the public health, safety, or welfare, or contrary to constitutional or property rights.
3. Following the denial of an application for development within the TPZ, the applicant may not resubmit the same plan within one year of the date of denial of the application.

(Chapters 37, 37A, 37B, Sections 6950 through 6980 - Added by Ordinance No. 2696 -

December 16, 1980)

(Section 6953.1(k) - Added by Ordinance No. 2863 - December 17, 1983)

(Section 6953.1(l), 6953.1(m), 6953.1(n), 6953.1(o) - Added by Ordinance No.

3452 -

December 15, 1992)

(Section 6963-6966, 6968-6972, 6974-6977 - Amended by Ordinance No. 3880 - January 19, 1999)

(Section 6979 - Amended by Ordinance No. 3190 - October 24, 1989)

(Section 6979 - Amended by Ordinance No. 3671 - September 12, 1995)

(Section 6979 - Amended by Ordinance No. 3720 - June 4, 1996)

(Section 6979 - Amended by Ordinance No. 3800 - November 18, 1997)

(Section 6979 - Renumbered by Ordinance No. 3880 - January 19, 1999)

(Section 6979.G - Amended by Ordinance No. 3002 - July 3, 1984)

JKE:kcd - JKE1182.6KR

(7/30/99)

## Marin County

**Notes:** Marin County is an interesting case. There is no reference to timber production or timber zoning in any of the on-line code available from Marin County's website except for the fact that the 1971 Marin County rules governing timber harvest are still on the

“books”. The rules however would appear to be moot because of the State **TPA** passage and rulings since **1976** and **1983**.

A call from Marin County Planning (Community Development) staff revealed that Marin does not have timber production zoning. However logging did occur on Inverness Ridge after a **1995** fire. At this time Marin County was informed by CDF that the private land owners had the right to log (this may have been partially a salvage logging plan but probably also involved “green” timber) and that Marin could comment as a responsible agency in the conventional manner. The logging took place (according to conversation with planning **staff**) in **1997** and **'98**. Since that time there have been no further logging plans though there is conifer forest (primarily **fir**) in private ownership. Most timber lands in Marin are either in various forms of conservation ownership or are essentially residential areas like San Anselmo where homes were built in existing redwood forest.

## Sonoma County

Notes: The following text is directly related to eligibility to rezone into TPZ. Except for property contiguous to and under that same ownership as adjacent TPZ land, the minimum acreages for rezoning into TPZ are **40** acres for CDF timber site class **I** and **II** and **80** acres for all other site classes i.e. **III** to **V**.

Sonoma County Code:

**Sec. 26C-72.** Zone change to timber production zone (TPZ).

(a) Property contiguous to and under the same ownership as an existing timber production zone.

(1) Minimum acreage: No minimum required.

(b) Timberlands not described in **Section 26C-72(a)** shall meet the following criteria for inclusion in the timber production district.

(1) Minimum acreage:

a. Sites **I** and **II** - Forty (40) acres.

b. All other sites - Eighty (80) acres.

(2) Applicant shall submit a plan for forest management, whose content shall be prepared or approved, by a licensed professional forester. Such plan shall provide for the eventual harvest of the timber within a reasonable period of time, as determined by the preparer of the plan.

(3) The parcel shall meet the current timber stocking standards and forest practice **rules** set forth by the board of forestry for the forest district or the coastal commission special treatment area or any other established by the board of forestry and pertinent to this county.

a. If the parcel does not meet current stocking standards as determined by the California Department of Forestry and Fire Protection, the owner must sign an agreement with the board of supervisors to meet such stocking standards and

forest practice rules by the fifth (5th) anniversary of the signing of such agreement;

b. If such stocking standards and forest practices are not met by the fifth (5th) anniversary date, the board of supervisors shall immediately rezone the parcel pursuant to Government Code Section 51121. (Ord. No. 5318 § 1, 2001.)

**Note:** This text block is from County document

---

**NOTE: SECTIONS BELOW IN SOME CASES CONTRADICT  
TPZ CONDUCT EXCLUSION BY THE STATE**

---

**Sec. 26C-70. Permitted uses subject to site development and erosion control standards.**

The following uses are permitted except within a sensitive area, riparian corridor, area of critical habitat, or unique feature designated in the general plan or coastal plan, in which case a use permit is required. Only those uses permitted in (a) and (b) are considered principal permitted uses, except that additional dwellings beyond one single-family dwelling are not considered to be principal permitted uses. All clearing of vegetation, grading, excavation, fill or construction in association with these uses shall conform to the site development and erosion control standards.

Notwithstanding those uses listed in Section 26C-70 and 71, no use shall be permitted contrary to California Government Code, Chapter 6.7, Article 1, Sections 51100 through 51155.

(a) Principal uses:

- (1) Management of lands and forests for the primary use of commercial production and harvest of trees, including controlled burns.
- (2) Removal of timber and fuel wood, including uses integrally related to growing, harvesting and on-site processing of forest products including, but not limited to, roads, log landings, log storage areas and incidental logging camps.
- (3) Recreational and educational uses, with or without fee, not requiring any permanent improvement of the land or interfering with the primary use (swimming, hunting, fishing, occasional camping, etc.).
- (4) Management of land for watershed, for fish and wildlife habitat, fish rearing ponds, hunting and fishing, grazing, where these uses are incidental to the primary use.
- (5) The erection, construction, alteration or maintenance of gas, electric, water or communication generating and transmission facilities, including necessary structures.
- (6) Contractor equipment storage incidental to the on-site growing and harvesting of forest products, including parking, repairing and storage of equipment so used. Construction of permanent structures will be subject to Article XXIX.
- (7) The production and harvesting of miscellaneous compatible forest products. (Christmas tree farms and greenery).

(8) Timber management, including planting, raising, harvesting and incidental milling for non-commercial purposes of trees and logs for lumber or fuel woods, subject to requirements of California Department of Forestry and Fire Protection.

(9) Temporary or seasonal sales and promotion, and incidental storage of fuel wood which is grown on site.

(b) Residential Uses:

(1) One single family dwelling unit with accessory buildings.

~~(2)~~ Additional detached single family dwelling units, not to exceed four ~~(4)~~ dwellings on a single ownership, provided that the density does not exceed one ~~(1)~~ single family dwelling unit per one hundred sixty ~~(160)~~ acres, or that density shown in the general plan land use element or that density permitted by a B combining district, whichever is the most restrictive. In the event that more than one ~~(1)~~ such single family dwelling unit is placed on a single lot, the additional dwellings shall be clustered with the primary dwelling in order to minimize roads, drives, and utility extensions. The additional dwellings shall also be subject to design review approval. Development shall comply with coastal plan policies.

(c) Other uses, unless such uses are in conflict with agriculture or timber production:

(1) One ~~(1)~~ guest house per lot.

(2) Occasional cultural events, provided that a written notice stating "The Sonoma County Permit and Resource Management Department will issue a zoning permit for a cultural event (state nature and duration) on this property if a written appeal is not received within ten (10) days from the date if this notice.". is posted on the property at least ten (10) days prior to issuance of a zoning permit, and no appeal pursuant to Section 26C-331 has been received from any interested person, and provided that approval is secured from the following departments: sheriff, public health, fire services, building inspection and public works. In the event of an appeal, a hearing on the project shall be held pursuant to Section 26C-331.

~~(3)~~ Small family day care.

(4) Large family day care provided that the applicant shall meet all performance standards listed in Section 26C-325.3.

(5) Small residential community care facility.

~~(6)~~ Non commercial kennels for up to ten (10) dogs.

(7) Beekeeping.

(8) All non-residential uses not requiring a use permit in the RRD district, but only on those portions of parcels which are not subject to timber production regulations.

(9) Ranch roads.

(10) Attached commercial telecommunication facilities subject to the applicable criteria set forth in Section 26C-325.7.

(11) Minor free-standing commercial telecommunication facilities, subject to the applicable criteria set forth in Section 26C-325.7, and subject to approval of a zoning permit, including environmental review, for which notice, including a site plan and one (1) elevation with dimensions for such facility, is mailed to adjacent property owners and posted on the subject property at least ten (10) days prior to

issuance of the permit and provided that no appeal pursuant to Article 33 has been received from any interested person. In the event of an appeal, a hearing on the project shall be held pursuant to the above article.

(12) Non-commercial telecommunication facilities eighty feet (80') or less in height subject to the applicable criteria set forth in Section 26C-325.7. Facilities between forty feet (40') and eighty feet (80') in height are subject to approval of a ministerial zoning permit for which notice is mailed to adjacent property owners and posted on the subject property at least ten (10) days prior to issuance of the permit and provided that no appeal pursuant to Article 33 has been received from any interested person. In the event of an appeal, a hearing on the project shall be held pursuant to the above article.

(13) Small wind energy systems not located within a county-designated urban service area or within two thousand five hundred feet (2,500') of a county-designated urban service area, subject to zoning permit approval and the standards in Section 26C-325.8.

(14) Other nonresidential uses which in the opinion of the planning director are of a similar and compatible nature to those uses described in Section 26C-70. (Ord. No. 5436 § 2(l), 2003; Ord. No. 5362 § 2(f), 2002; Ord. No. 5343 § 4, 2002; Ord. No. 5318 § 1, 2001.)

Sec. 26C-71. Uses requiring a use permit.

(a) Sensitive area uses:

(1) Permitted uses listed in Section 26C-70 when located within a sensitive area, riparian corridor, critical habitat area, or unique feature designated in the general plan or coastal plan.

(2) Any clearing of vegetation, grading, excavation, fill or construction when located within a sensitive area, riparian corridor, critical habitat area, or unique feature designated in the general plan or coastal plan.

(b) Resource management uses:

(1) Saw mills, planer mills, pulp mills, particle board plants, log ponds, earth-filled dams and lumber yards, with associated uses.

(2) Development and utilization of natural resources with appurtenant structures. Hardrock quarry operations may be permitted only if they meet the criteria below:

a. The operation is consistent with the purpose(s) of the resources and rural development district;

b. The operation involves five (5) acres of land or less;

c. The operation results in annual production of five thousand (5,000) cubic yards or less;

d. The quarry does not include crushing, screening, or batching operations;

e. The operation is subject to payment of fees and other mitigation measures as may be found consistent with aggregate resources management plan;

f. The operation must have an approved reclamation plan;

g. The operation is located at least four (4) miles from the nearest approved source of aggregate materials.

Other aggregate mining operations are not permitted unless excepted by Section 26A-05-010 of the this code.

(4) Contractor equipment storage for off-site growing and harvesting of forest products, including packing, repairing and storage of equipment so used.

Construction of permanent structures will be subject to Article XXIX.

(5) Commercial wood yards, including wood splitting and sales of off-site fuel woods.

(c) Other uses, unless such uses are in conflict with agriculture or timber production:

(1) Aircraft landing facilities incidental to permitted forestry and recreation related uses.

(2) Permanently located and improved private and public campgrounds, resorts and "organized camps."

(3) Such use which does not significantly detract from the use of the property for, or inhibit, growing and harvesting timber. Any facilities constructed for such use would not be permanent residences, except as provided in other portions of Article VII.

(4) All nonresidential uses permitted with a use permit in the RRD district, but only on those portions of parcels not subject to timber production regulations.

(5) Exploration and development of low temperature geothermal resources for other than power development purposes provided that at a minimum it is compatible with surrounding land uses.

(6) Small wind energy systems located within a county-designated urban service area or within two thousand five hundred feet (2,500') of a county-designated urban service area, subject to the standards in Section 26C-325.8. (Ord. No. 5436 § 2(m), 2003; Ord. No. 5362 § 2(n), 2002; Ord. No. 5343 § 5, 2002; Ord. No. 5318 § 1, 2001.)

## **Mendocino County**

Notes: Mendocino County has 3 forest resource zones, TPZ 160 acre minimum parcel size, FL (Forest Lands) 160 acres minimum parcel size and Remote Resource Lands, minimum parcel size 640 acres. This is one "section" or a square mile. In the County General Plan there is a zone RM or Remote Residential with a acreage of 20 or 40 acres but it does not list logging as a permitted use. Quote: "The RMR classification is intended to be applied to lands having constraints for commercial agriculture, timber production or grazing, which are well suited for small scale farming and low density agricultural/residential uses by the absence of such limitations as inadequate access, unacceptable hazard exposure or incompatibility with adjoining resource land uses. The classification is also applied to some areas which might not otherwise qualify except for the fact that the land has been divided and substantial development has occurred."

County text follows:

### **Title 20 MENDOCINO COUNTY ZONING ORDINANCE**

#### **CHAPTER 20.068 TPZ TIMBERLAND PRODUCTION ZONING DISTRICT**

Sec. 20.068.035 Minimum Lot Area.

One hundred sixty (160) acres. (Ord. No. 3639 (part), adopted 1987)

Sec. 22.07.020 Creation of Timberland Production Zones.

(A) Property within the County of Mendocino may be incorporated into Timber Land Production Zones through the following procedures:

(1) Applicants shall file, or cause to be filed, an application for rezoning pursuant to the Mendocino County Code.

(2) In addition, applicant shall submit, pursuant to California Government Code, Section 5 1113:

(a) A map showing the legal description or the Assessor's parcel number of the property to be zoned.

(b) A plan for forest management for the property prepared or approved as to content by a registered professional forester. Such a plan shall adhere to the minimum standards for format as prescribed by the County and shall provide for the eventual harvest of timber within a reasonable period of time, as determined by the preparer of the plan. (Ord. No. 3453, adopted 1983, as amended by Ord. No. 3482, adopted 1984.)

(c) A statement signed by applicant(s) and registered professional forester stating the parcel(s) under consideration currently meets timber stocking standards as set forth in Section 4561 of the California Public Resources Code and the forest practice rules adopted by the State Board of Forestry for the district in which the parcel is located. (Ord. No. 3453, adopted 1983, as amended by Ord. No. 3482, adopted 1984.)

(d) If condition 2c cannot be immediately met, owner shall sign an agreement with the Board of Supervisors to meet such stocking standards and forest practice rules by the fifth anniversary of the signing of the agreement. At that time, condition 2c shall be met. Upon the fifth anniversary of the signing of such an agreement, the Board shall determine whether the parcel meets the timber stocking standards in effect on the date the agreement was signed. If the parcel fails to meet the timber stocking standards, the Board shall immediately rezone the parcel and specify a new zone for such parcel which is in conformance with the county General Plan and whose primary use is other than timberland.

(e) Applicant shall sign and file a statement for the parcel(s) under consideration stating the ownership is of one person as defined in Section 38106 of the California Revenue and Taxation Code, and said parcel(s) are comprised of single or contiguous parcels. (Ord. No. 3453, adopted 1983, as amended by Ord. No. 3482, adopted 1984.)

(3) Before application is presented to the Planning Commission, said application shall be circulated for review and comment to the County Farm Advisor, the County Assessor, the County Agricultural Commissioner, and the California Department of Forestry.

(4) Prior to rezoning pursuant to this section, all uses on property shall be in compliance to those uses as established under Section 20-121, et seq., which govern permitted and compatible uses. (Ord. No. 3453, adopted 1983.)

Sec. 20.068.010 Permitted Uses.

The following compatible use types are permitted in the TPZ District:

(A) Residential Use Types (See Chapter 20.016).

Family residential-single-family.

(B) Civic Use Types (See Chapter 20.020).

Community recreation;

Essential services;

Fire and police protection services;

Minor impact utilities.

(C) Agricultural Use Types (See Chapter 20.032).

Animal raising-general agriculture;

Forest production and processing-all types;

Horticulture;

Packing and processing-limited,

Row and field crops;

Tree crops.

(D) Accessory uses as provided in Chapter 20.164. (Ord. No. 3639 (part), adopted 1987)

Sec. 20.068.030 Special Provisions.

No use permit shall be granted in a TPZ District until a specific finding has been made that the proposed use is compatible with the growing and harvesting of timber and timber products. (Ord. No. 3639 (part), adopted 1987)

INSERT FL Zoning

Sec. 20.064.030 Minimum Lot Area.

One hundred sixty (160) acres. (Ord. No. 3639 (part), adopted 1987)

Sec. 20.064.005 Intent.

This district is intended to create and preserve areas suited for the growing, harvesting and production of timber and timber-related products. Processing of products produced on the premises would be permitted as would certain commercial activities associated with timber production and the raising of livestock. Typically the F-L District would be applied to lands not zoned Timberland Production but which have the present or future potential for timber production, intermixed smaller parcels and other contiguous lands, the inclusion of which is necessary

**for the protection of efficient management of timber resource lands.  
(Ord. No. 3639 (part), adopted 1987)**

---

## Mendocino County General Plan Sections

### FOREST LANDS (FL)

Intent. The Forest Lands classification is intended to be applied to lands which are suited for and are appropriately retained for the growing, harvesting and production of timber and timber-related products. The classification should include lands eligible to be zoned Timberland Production; intermixed smaller parcels and other contiguous lands, the inclusion of which is necessary for the protection and efficient management of timber resource lands.

General Uses. Residential uses, forestry, timber processing, agricultural uses, cottage industries, residential clustering, uses determined to be related to and compatible with forestry, conservation, processing, and development of natural resources, recreation, utility installations.

Minimum Parcel Size. One hundred sixty acres.

Maximum Dwelling Density. One dwelling per **160** acres, County review and approval required for more than one dwelling per legally created parcel.

### REMOTE RESIDENTIAL (RMR:20 ACRES, RMR:40 ACRES)

Intent. The RMR classification is intended to be applied to lands having constraints for commercial agriculture, timber production or grazing, which are well suited for small scale farming and low density agricultural/residential uses by the absence of such limitations as inadequate access, unacceptable hazard exposure or incompatibility with adjoining resource land uses. The classification is also applied to some areas which might not otherwise qualify except for the fact that the land has been divided and substantial development has occurred.

General Uses. Residential uses, agricultural uses, cottage industries, residential clustering, public facilities, conservation and development of natural resources, and recreation, utility installations.

Minimum Parcel Size. Twenty acres, or forty acres, as designated on the Land Use Map.

Maximum Dwelling Density. One dwelling per 20 acres or **40** acres as designated on the **Land** Use Map.

County review and approval required for more than one dwelling per legally created parcel.

### REMOTE RESOURCE LANDS

Intent. Remote Resource Lands classification is intended to be applied to lands which are suited for and are appropriately retained for the grazing of livestock and the production of timber. The classification is intended to protect these lands from the pressures of residential development.

General Uses. Grazing, agriculture, forestry, residential, residential clustering, conservation, processing, and development of natural resources, recreation, uses determined to be related to and compatible with ranching and timber operations, utility installations.

Minimum Parcel Size. 640 acres.

Maximum Dwelling Density. One dwelling per 640 acres, including employee housing.

County review and approval required for more than one dwelling per legally created parcel.

## Humboldt County

Notes: Humboldt County may be the CA Coast County most economically coupled with Timber Production (dimensional lumber) and wood pulp mills. Its policies, like those of most California counties with timber resources including Santa Cruz, are based on the principle of compatible uses. Nowhere else in California has “compatible use” been more heavily tested and proved to be contradictory. Particularly, the “compatible uses” of “watershed management” **and** “management for fish and wildlife habitat” have been shown to be in conflict with the protection of “public trust resources”, generally water resources and wildlife. Commercial and sport salmon fishing has been dramatically limited. Ocean salmon fishing, once a major Humboldt County industry in its own right, has been severely curtailed with fishing restrictions due to the collapse of salmon populations. The most significant reason for the decline in salmonid populations is long term, chronic damage to forested habitats where the fish spawn and the juvenile life stage takes place. The Federal and State Endangered Species Acts have been used to list salmonids as Threatened/Endangered. Several other vertebrate species (such as birds and amphibians) are listed as a result of the transformations of forest habitats by logging. The North Coast Regional Water Quality Control Board has, after extensive, severe, and well documented damage to water quality, stream sedimentation, and more frequent flooding, required “Waste Discharge Permits” (WDRs) instead of “Waivers” for logging operations in several watersheds including Freshwater Creek and Elk River. The Board approved limits on the “rate of cut” (acreage allowed to be logged per year **as** a percentage of watershed area). The North Coast Board is the only one of the **9** Regional Boards to take this step for logging caused pollution and aquatic habitat destruction.

### Zoning Density Range:

The density **is** established through zoning to allow for minimum parcel sizes of **160** acres for most forest areas (presumably TPZ). For Site Class **1, II** and **III**. The following findings must be made in determining appropriate parcel sizes less than **160** acres.. etc below.

(continuing)

Subdivision to the minimum parcel size allowed in the zone may be permitted where no parcel is created with less than forty (40) acres of Site **III** or lower **or** twenty (20) acres of Site **II** or higher, except where separate management units of a smaller size already exist and based on the findings that: **A, B, C, and D in the following text under section 2515 below.**

## 2510 TIMBERLANDS

### 2511 Background

Timber and agricultural production are similar in that **both** are dependent on the quality and character of the land, and the degree **of** management

that is practiced. The true resource is the soil, topography, climate, and that which exists upon the land as a product of the above factors. Management technology is an interrelated human resource which greatly affects the productivity of the primary resource, the land. Humboldt County contains extensive areas of forestland which rank among the most productive in the world. Consequently, management practices can have a profound effect on productivity gains and employment.

The 1978 Economic Development Action Plan and Strategy for Humboldt County states that the timber products industry is at a critical stage in its development. There is the opportunity for the timber industry to stabilize the economy if, at a first step, adequate raw materials are available. To quote from the Action Plan, "This means that there should be a commitment to grow and harvest timber on all good timber lands." Through Humboldt County's implementation of the Timberland Production Zone (TPZ), nearly one million acres of good forestland were placed in a zone which provides reduced tax assessments in exchange for a devotion to timber growth and harvest and compatible uses.

Although competition among various land uses is escalating, the Timberland Production Zone provides relative assurances that uses allowed within the affected timberlands will be consistent with local needs in resource economics, open space, and compatibility of uses. TPZ classification provides a static productive land base from which accurate timber supply projections can be made.

The Action Plan indicates that a significant portion of the County's timberlands are not fully productive and recommends a sizeable investment to be made for realization of productive potential. Given the social and economic benefits of added productivity the General Plan supports the efforts which promote this goal. This is a primary consideration, especially when land values are increasing to a level where pressure is created for alternative uses of unequally productive lands.

Approximately 43% of the total land within the County is classified Timberland Production Zone. In addition, about 20% of the County's total acreage is managed by timber production oriented public entities. The combination of these factors provides a stable resource base for manufacturing facilities, maintenance of a viable labor force, and fulfilling lumber demands.

In the summer of **1981** the Planning Department prepared the Timberlands Policy Background Study which received considerable input and testimony during the technical workshops and hearings. The County Planning Commission approved this draft document for inclusion in the General Plan Hearing Draft after considering additional options and information presented in public workshops.

The study contains available resource inventories to give an overview of the timberland resource base of the County. It has been determined that creation of forestland holdings smaller than **160** acres can have positive impact to future growth and harvest, provided that the owners of the created parcels actively pursue a timber management program, do not engage in uses which inhibit or detract from timber production, and make cost effective investment to the resources. Size of parcel may dictate how fast it can or will be brought under complete management, but this has to do, in large measure, with the means and resources the land owner has at command. "Owner intent" is a much more important consideration in this situation. If an owner is intent on producing timber he will eventually bring all of his land, regardless of size, under management to meet that objective.

### **2513 GOAL**

To actively protect and conserve timberlands for long-term economic utilization and to actively enhance and increase county timber production capabilities.

### **2514 POLICIES**

1. Timberlands shall be retained for timber production, harvesting and compatible uses, and reclassification of Timberland Production Zones (TPZ) shall be done in accordance with statutory requirements.
2. Avoid, wherever practical, the location of any state or local public improvements and any improvements of public utilities, and the acquisition of land therefore, in Timberland Production Zones where the project will have a significant adverse effect on the production of timber.
3. Encourage the long-term management of timberlands.
4. Support the use of forest improvement programs, whether funded publicly or privately, whether in a TPZ or other forestland.
5. Affirm and support the public services provided by County government which are necessary in maintaining a viable forest products industry.

6. Encourage, consistent with the Rural Development Section 2550, improved site productivity, timber growth and harvesting through intensive forestry management.

7. The County supports zoning correction of land from the Timberland Production Zone when it can be found that:

- A. The original inclusion was in error or inappropriate; or
- B. The conversion is necessary to provide for the logical expansion of an existing community

## Code Sections

### 2515 STANDARDS

1. Definition: The Timber Production designation shall be restricted to those parcels originally zoned Timberland Production Zone. Portions of these parcels not zoned TPZ may be developed consistent with the existing zone and in compliance with all applicable federal, state and County regulations.
2. See Land Use Designations Section 2721.
3. Conversions for the expansion of a community shall be in conformance with the findings required in the Government Code. 2720 RESOURCE PRODUCTION

### 2721 Timber Production (T)

1. Character: The Timber Production designation is utilized to classify land that is primarily suitable for the growing, harvesting and production of timber. The designation shall be restricted to those parcels originally zoned Timberland Production. Portions of these parcels not zoned TPZ may be developed consistent with the existing zone and in compliance with all applicable federal, state and County regulations.
2. Primary and Compatible Uses: Primary uses include the growing and harvesting of timber and timber production facilities, including portable processing equipment. No use shall be permitted in Timber Production that significantly detracts from or inhibits the growing and harvesting of timber. Compatible uses other than the direct growing, harvesting and portable processing of timber include:
  - A) Watershed management.
  - B) Management for fish and wildlife habitat.

C) A use integrally related to the growing, harvesting and processing of forest products, including but not limited to roads, log landings, and log storage areas (portable chippers and portable sawmills are considered a part of "processing").

D) The erection, construction, alteration or maintenance of gas, electricity, water or communication transmission facilities consistent with Section 2514.2.

E) Grazing and other agricultural uses.

F) No more than two single-family dwelling units and normal accessory uses and structures for owner and caretaker. The second dwelling unit shall require a use permit and shall be conditioned so as to not constitute a subdivision of the parcel. Minor conversion of timberland for residential use is limited to an area of 5% of the total parcel, to a maximum area of two acres for a homesite and appurtenant uses. The total area need not be a contiguous unit.

G) Temporary labor camps, less than one year in duration, accessory to timber harvesting, processing or planting operations.

H) Recreational uses under the control of the owner which will not significantly detract from or inhibit timber or agricultural production on the project site or adjoining lands.

I) All prudent reforestation activities including site preparation.

3. Density Range: The density is established through zoning to allow for minimum parcel sizes of **160** acres ~~to~~ 20 acres. The following findings must be made in determining appropriate parcel sizes less than **160** acres.

A. Zoning to a minimum parcel size of forty (**40**) acres is based on the findings that:

1. It shall not significantly detract from the use of the property for, or inhibit, growing and harvesting of timber; and

2. It shall not inhibit economically viable agricultural and timber production on adjoining lands; and

3. Uses and parcel sizes in the adjoining area are compatible; and

4. It is consistent with a comprehensive view of all relevant plan policies.

B. Zoning to a minimum parcel size of twenty (20) acres is based on the findings in 3(A) above and that:

1. The timber site designation is Site II or above; and
2. Each parcel has frontage on an existing publicly maintained road; and
3. All such zoning is within 1/4 mile of an existing maintained public road.
4. Subdivision to the minimum parcel size allowed in the zone may be permitted where no parcel is created with less than forty (40) acres of Site III or lower or twenty (20) acres of Site II or higher, except where separate management units of a smaller size already exist and based on the findings that:
  - A. The subdivision will result in significant improvements (including but not limited to stocking and conifer release) in site productivity, timber growth and harvest through intensive management; and
  - B. Adequate access, water and geologic stability can be demonstrated for the proposed use and the land division meets all other regulatory requirements; and
  - C. On each parcel, the residential site is located, to the fullest practical extent, in areas of the lowest productivity.
  - D. Access to the remainder is consistent with the uses of the remaining property.
  - E. A joint timber management plan will be prepared on the division.
5. Lot Line Adjustments of TPZ may be approved without regard to the, standards 3 and 4 of this section in order to consolidate by merger logical management units. Such adjustments shall be in keeping with the spirit and intent of TPZ and shall not result in a net reduction of the area of TPZ available for forest management.
6. The total density shall not exceed one (1) dwelling unit per twenty (20) acres. A use permit or special permit shall be required where a density of more than one dwelling unit per 40 acres or larger parcel is sought. Parcels less than 40 acres shall not have second units. Homesite coverage shall not exceed 2 acres total for both dwellings and accessory structures. (Res. 89-106, 6/27/89)

## Del Norte County

Notes: Del Norte County lists no reference to TPZ zoning on its website or other matters related to timber production. I infer from this that the county does not engage in timber harvest supervision or other matter such as zoning. This has not been verified by contact with County staff. There is private redwood timberland in Del Norte. However the largest timber areas are in the Six Rivers National Forest including the Smith River National Conservation Area where management is under federal authority.

## Lake County

Notes: Lake County surrounds Clear Lake the largest true lake in California. The County includes private timber lands and Mendocino National Forest land.

TPZ zoned parcels “shall be comprised of single or contiguous parcels totaling eighty (80) acres, or forty (40) acres for Class I or II timberland soils.”

County text:

### 6-**I** ARTICLE 6

#### SEC DISTRICT

6.1 Purpose: To provide for timberland preserve zoning and the conservation and protection of land capable of producing timber and forest products. The uses specified in this Section have been determined to be compatible uses consistent with the Timberland Productivity Act of 1982. The following regulations shall apply in all “TPZ” districts.

6.2 Applicability  
following criteria:

(a) The land area concerned shall be in the ownership of one person, as defined in Section 38106 of the Revenue and Taxation Code and shall be comprised of single or contiguous parcels totaling eighty (80) acres, or forty (40) acres for Class I or II timberland soils.

(b) The land shall be a site quality Class V or higher under Section 434 of the Revenue and Taxation Code.

6

(a) Applicants shall submit to the Planning Department a legible map drawn to scale defining the parcel(s) to be included. Said map shall be accompanied by an accurate legal description of the subject parcel(s).

(b) Applicants shall submit to the Planning Department a plan for forest management either prepared by or approved as to content by a registered professional forester. The plan shall provide for the eventual harvest of timber within a reasonable period of time, as determined by the preparer of the plan.

(c) The parcel(s) shall currently meet the timber stocking standards as set forth in Section **4561** of the Public Resources Code and the forest practice rules adopted by the State Board of Forestry for the district in which the parcel(s) is located, or the owner must sign an agreement with the Board of Supervisors to meet these stocking standards and forest practice rules by the fifth anniversary of the signing of the agreement. If the parcel is subsequently zoned as "TPZ, failure to meet the stocking standards and forest practice rules within this time period provides the Board with grounds for rezoning of the parcel pursuant to Government Code Section **51121**.

(d) The parcel(s) shall be timberland, as defined in Subdivision **(9)** of Government Code Section **51104**.

6.4 Performance standards: All uses permitted within this district shall be subject to the performance standards set forth in Article **41**.

## **6-2**

### **6**

(a) Management of lands and forests for the primary use of commercial production and harvest of trees.

(b) Removal of timber, including uses integrally related to growing, harvesting and on-site processing of forest products including, but not limited to, roads, log landings, log storage areas; and incidental logging camps during harvest.

(c) One **(1)** single-family dwelling or mobile home which shall be constructed according to the residential construction standards of Section 10.20.

(d) Agricultural and residential accessory uses and accessory structures; small kennels.

(e) Crop and livestock farming, apiaries, aviaries, except those uses indicated in Sections 6.6 and 6.7.

**(9)** Prospecting, claiming, and preliminary geophysical investigations for natural resources including oil, gas, geothermal, or other mineral resources.

(g) Game preserves.

(h) Management for watershed.

(i) Management for fish and wildlife habitat.

(Article 27.

6

(a) Uses permitted in Section 6.5 when not in compliance with the performance standards set forth in Article **41**.

(b) Equipment storage yards incidental to the growing and harvesting of forest products, including parking, repairing and storage of equipment so used.

(c) Private fishing and hunting clubs on parcel(s) containing not less than forty **(40)** acres; and commercial fishing and hunting clubs on parcel(s) containing not less than one hundred **(100)** acres.

(d) Commercial wood yards.

(e) Commercial dairies.

**(9)** Large and commercial kennels; commercial stables or riding academies.

**No 6-3**

(g) Uses which are minor additions or alterations to existing uses or structures permitted by Section 6.5, limited to an increase of twenty (20) percent of the use area or gross floor area of the structure(s).

(h) Those uses permitted in the "TPZ" district with a minor use permit in Table B, Article 27.

6

(a) Uses permitted in Sections 6.5 and 6.6 when not in compliance with the performance standards set forth in Article 41.

(b) Saw mills, planer mills, pulp mills, particle board plants, and log ponds, with associated uses.

(c) Retreats, public and private campgrounds, and recreational vehicle parks. No

(d) Cattle and hog feed yards, veal calf feeders, and animal sales yards.

(e) Those uses permitted in the "TPZ" district with a major use permit in Table B, Article 27.

## SEC

**6**

- (a) All parcels except as noted below: One hundred sixty **(160)** acres.
- (b) For parcels with Class I or II timberland soils and a joint timber management plan as required in Government Code Section **51119.5**: Forty **(40)** acres.
- (c) For parcels with less than forty (40) acres of Class I or II timberland soils and a joint timber management plan as required in Government Code Section **51119.5**: Eighty **(80)** acres.

**6**

- (a) Front yard: Thirty (30) feet from lot line, or fifty-five (55) feet from centerline of roadway, whichever is greater. Yards abutting streets are front yards.
- (b) Rear yard: Twenty-five (25) feet from lot line.
- (c) Side yard: Fifteen **(15)** feet from lot line.
- (d) Accessory uses: The above yards shall apply.

**6**

- (a) Principal structure: Thirty-five (35) feet.
- (b) Accessory structure: Twenty (20) feet.
- (c) Agricultural accessory structures: Forty-five (45) feet.

**6.14** Parking: The following minimum parking requirements shall apply except as provided in Article 46.

- (a) Residential use: two (2) spaces.
- (b) Other uses: As provided for in Article 46.

6As provided in Article 45.

6.16 Notice of farming practices: Shall be required as set forth in Section 4.18 for all single-family dwellings and farm labor quarters.

6.17 Minimum residential construction standards: All single-family dwellings except "Temporary Dwellings" and "Farm Labor Quarters" shall meet the minimum residential construction standards of the "R1" district, Section 10.20.

6.18 DEVELOPMENT STANDARDS EXCEPTIONS: FOR EXCEPTIONS TO THE DEVELOPMENT STANDARDS OF THIS ARTICLE, SEE ARTICLE 42. (Ord. 1749, 7/7/1988)

## SEC 6

(a) Changes or additions to any nonconforming uses shall be limited to ordinary maintenance and repair, except that no change or addition which enlarges or tends to make more permanent any nonconforming use shall be permitted.

(b) If any nonconforming use ceases for a period of one year or more, use subsequent to the cessation shall comply with this Article.

## Trinity County

Notes: Trinity County had a total of 797 parcels (260,768.86 acres) under TPZ zoning. This calculates to an average size per parcel of 259 acres. County planning and zoning code is not available on line and I am waiting for a return phone call from County Planning.

## Text from 2004 Trinity County Assessment Practices Survey

On November 1, 1976, the Trinity County Board of Supervisors adopted Ordinance No. 315, applying to Trinity County the California Timberland Productivity Act of 1982. This act, briefly described above, encourages the continued use of timberlands for the production of trees and timber products by restricting the use of certain timberland to the production of timber products and compatible uses. The board of supervisors has amended the local ordinance on several occasions to (1) revise the allowed uses and the uses where a special use permit is required, (2) define uses that are considered compatible uses, (3) establish minimum acreage requirements, (4) change zoning requirements, and (5) update the ordinance to keep it consistent with changing statutory provisions. On the 2002-03 assessment roll, Trinity County had a total of 797 parcels (260,768.86 acres) under TPZ zoning, with a total assessed value of \$27,603,567. There were no parcels in non-renewal status. The previous chief appraiser, a registered forester, originally classified the TPZ parcels in Trinity County; no site classification changes have been made. The assessor's computer system allows the designation of TPZ parcels as required by section 433, and assessed values are calculated automatically based upon the BOE's site class values. The assessor strictly adheres to section 435 and annually updates the site classification values. The county's ordinance clearly defines all permitted and compatible uses allowed on TPZ land. The landowner must obtain a use permit for all compatible uses. The county planning department closely monitors compatible uses of TPZ lands. The assessor receives use permits from the planning department and effectively tracks all compatible uses.

## Shasta County

**Notes:** These are the minimum acreage requirements for TPZ zoning. 40 acres for site Class I, 60 acres for site Class II, and 80 acres for site Classes III to V. Subdivision of other zone district land (apparently residential zones) is limited when adjacent to TPZ.

**Excerpt: “From a land use planning perspective,** the timberland supply is impacted due to the conversion of timberland to other land uses which are incompatible with timber operations and management. Such uses are most often associated with rural residential uses which limit efficient timber management. In addition, these land use activities and patterns can create situations where management for wildland fires is much more difficult, both for adjacent timberlands and within such forested rural residential areas. Additional loss of timber resources is attributable to parcelization into lot sizes inefficient for economic timber production. Negative impacts from forest practices may affect surrounding land uses and resources and create special management problems for timberland operations. Harvesting practices and the associated noise, dust, and traffic can be potentially damaging to air and water resources, wildlife habitats, aesthetic enjoyment, and the health and safety of nearby residences, although state-required timber harvest plans are intended to mitigate timber harvesting impacts to acceptable levels. These problems can be magnified if incompatible land uses locate too close to one another. Therefore, it is in everyone’s best interest that the General Plan employ effective measures to avoid and/or minimize land use conflicts as is feasible. The County has adopted an “agricultural and timber use” ordinance for timber resource areas to advise future property owners that where land divisions occur adjacent to a timber use area, they may be subject to impacts from the conduct of existing and future forest management-related activities that may be considered objectionable (Shasta County Ordinance No. 94-2).”

### Shasta County General Plan

6.2.01

#### 6.2 TIMBERLANDS

##### 6.2.1 Introduction

The Shasta County Timberlands Element is a combination of planning requirements from the

mandated Land Use, Conservation, and Open Space Elements. Portions of these mandatory elements relevant to timberlands are cited below. A land use element which designates the proposed general distribution and general location and extent of the use of land for...natural resources...The diagram for the land use element shall designate those parcels of real property for timberland production which have been so zoned pursuant to the California Timberland Productivity Act of 1982, Chapter 6.7 (commencing with Section 51100) of Part 1 of Division 1 of Title 5 (Government Code Section 65302 (a). A conservation element for the conservation, development and utilization of natural resources including...forests...the conservation element may also cover...protection of watersheds.... (Government Code Section 64302(d). Open space for the managed production of resources, including...forest lands.... (Government Code Section 65560(b)(2). Parcels zoned as timberland preserve shall be zoned so as to restrict their use to growing and harvesting and to compatible uses and shall be entered as a timber preserve element of the County General Plan. (Government Code Section 51115). Forest management is the application of business methods and forestry principles to the operation of a forest property for the purpose of maintaining forest resources and producing a continuous supply of forest products. Forest management is based on sound

silviculture practices. Silviculture is the theory and practice of controlling the establishment, composition, and growth of forests. The State Forest Practice Rules defines a "silvicultural system" as a planned program of forest stand treatments during the life of a stand. It consists of a number of integrated steps conducted in logical sequence leading to or maintaining a forest of distinctive forms for the level of management intensity desired, which includes, but are not limited to, site preparation, planting, harvesting, road construction, insect and disease control, inventory, and fire protection. Land dedicated to commercial forest management provides not only building materials, energy for industrial processes, firewood, County revenue for roads and schools, and employment opportunities, but also wildlife habitat, recreational opportunities, aesthetic enjoyment, and watershed. Maintaining timber operations and preservation of valuable timberlands are important to the economic base and the natural resource values of Shasta County. The Timberlands Element, therefore, relates present and future uses of timberlands to the natural resource, economic, and community development plans for Shasta County.

**6.2.2 Findings** One of Shasta County's most valuable resources is its timberland. Of the County's 2,428,000 total acres, 50.7 percent or 1,231,000 acres are dedicated to commercial forest uses.<sup>1,2</sup> In 2002, 613,495 acres of non-federally owned timberlands were designated in timber preserve zones (TPZs) pursuant to California's Forest Taxation Reform Act of 1976.<sup>3</sup> These timber preserve lands represent nearly half of all County timberlands and approximately 87 percent of privately owned timberlands. A breakdown of commercial forest land by ownership class is presented in Table T-1. The forest industry and miscellaneous private corporations control over 50 percent of the total commercial timberland in the County.

**TABLE T-1  
COMMERCIAL FOREST LANDS IN SHASTA COUNTY BY OWNERSHIP  
CLASS, 2004**

<b>OWNERSHIP</b>	<b>ACRES</b>	<b>%</b>
National Forest	466,000	38
Other Public	63,000	5
<b>TOTAL PUBLIC</b>	<b>529,000</b>	<b>43</b>
Private Forest Industry	527,000	43
Private Farmer-Owner	39,000	3
Misc. Private	136,000	11
<b>TOTAL PRIVATE</b>	<b>702,000</b>	<b>57</b>
<b>TOTAL - ALL</b>	<b>1,231,000</b>	<b>100</b>

1. National Forest (NF) commercial timber acreage represents approximately 62 percent of USFS lands in Shasta County, based on review of area Forest Plans. There are 749,000 USFS acres in the County, including 409,000 acres in the Shasta NF, 31,000 acres in the Trinity NF, and 249,000 acres in the Lassen NF.

2. "Other Public" lands include lands administered by the Bureau of Land Management (BLM); the Bureau of Indian Affairs; miscellaneous federal agencies; lands owned by states, counties, and local public agencies, and lands leased by governmental units for more than 50 years.

3. "Private Forest Industry" lands are owned by companies or individuals operating wood-using plants.

4. "Farmer-Owned" lands are those owned by operators of farms.

5. "Miscellaneous Private" lands are privately owned lands other than forest industry or farmer-owned lands.

**Source:** Shasta County Assessor's Office, California; California Board of Equalization; USDA, Forest Service, Pacific Northwest Research Station, Portland Oregon; Department of Forestry and Fire Protection, Fire and Resource Assessment Program.

Under the Forest Taxation Reform Act, non-federal timber producing lands can be classified by the County's Zoning Plan as timber preserve zones (TPZs) through a process involving the Assessor, Planning Commission, Board of Supervisors, and timber owners. Such lands may be used for growing of forest products and compatible uses only, and property taxes for these lands are based on these limited uses. Forest lands outside of TPZ may also be assessed for their aesthetic or amenity value. When timberlands are harvested, a special yield tax is to be paid to the State for all forest products regardless of the zoning classification. Most of this tax revenue is returned to the county of origin. Table T-2 shows the breakdown of acres and leading ownership of timberlands within TPZs in Shasta County.

**TABLE T-2**

**LEADING OWNERSHIP IN TIMBER PRESERVE ZONES**

**IN SHASTA COUNTY JANUARY, 2003**

**LANDOWNER Acres in TPZ % of Total Acres**

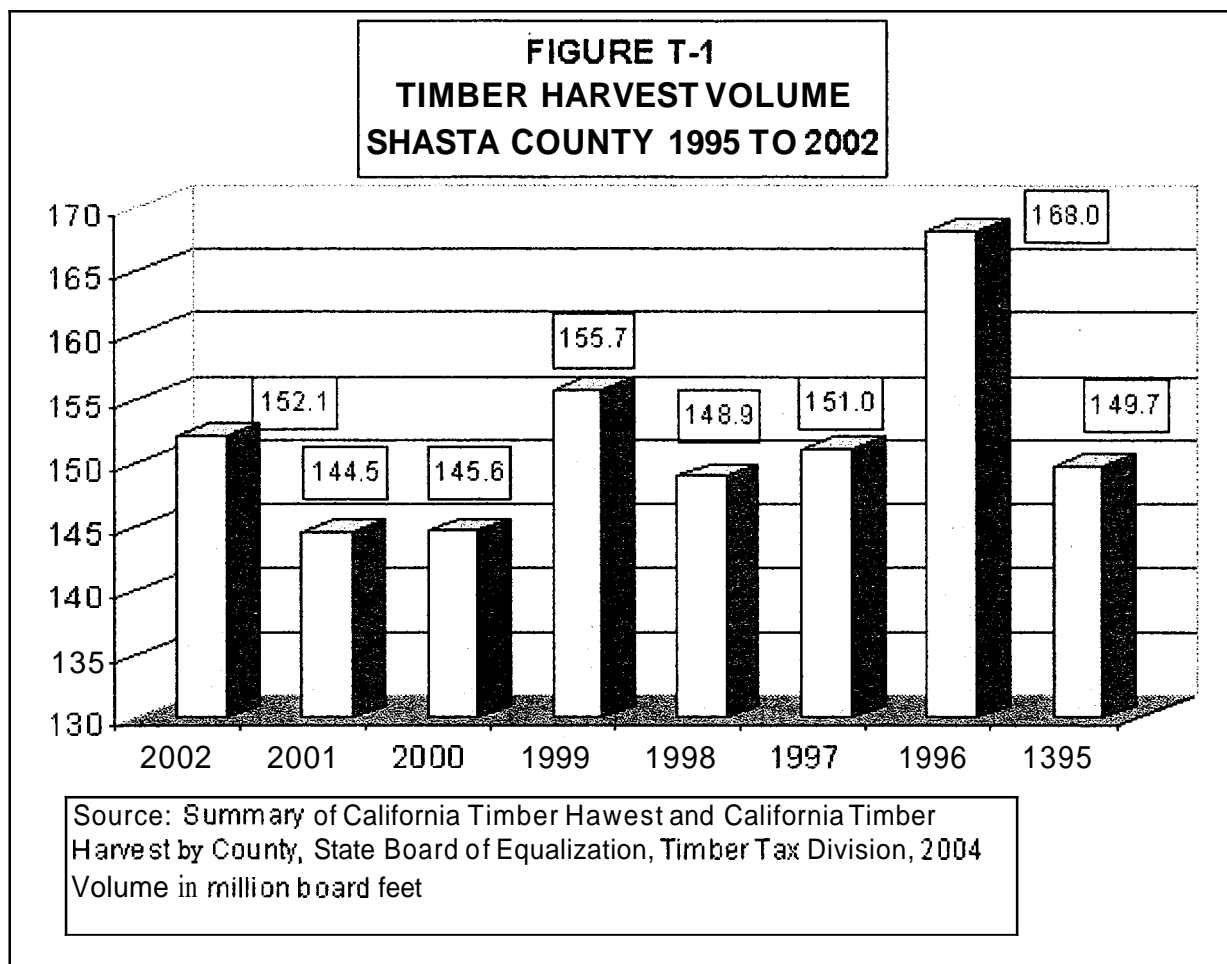
Sierra Pacific Industries	221,560	36.1
Roseburg Resources Co.	122,485	20.0
Fruit Growers Supply	81,164	13.1
Brooks Walker	47,482	7.6
Hearst Corporation	39,733	7.2
Walter Walker	15,900	2.5
Crane Mills Corporation	16,005	2.5
Sierra Pacific Holding Company	11,845	1.8
Red River Forests Partnership	11,073	1.7
Latour State Forest	9,003	1.5
John Hancock Mutual Life	1,594	0.3
Other TPZ lands	35,651	5.7
<b>TOTAL TPZ lands</b>	<b>613,495</b>	<b>100</b>

**Source:** Shasta County Assessor, January 1, 2004

The timber industry is important to the economy of the State as well as the County. In 2002, the

County was the third ranking timber county producing a harvest amounting to 152.1 million board feet and valued at \$39.2 million for timber cut from both private and public lands (see Figures T-1 and T-2). Revenue to the County budget from timber harvested on federal forest lands amounted to over \$367,098 dollars in timber yield taxes in 2003. The County's relative position as a timber producer has been consistent with overall statewide trends through the 1990's. Timber harvest volumes increased significantly during the first part of the decade while value declined. This trend was altered during the latter part of the 1990's, due, in part, to new timber management and environmental concerns affecting state and federal timber harvest policies. While the timber industry has historically constituted a large segment of Shasta County's employment base, its prominence in this regard has been reduced. The nature of Shasta County's economy has undergone significant structural changes, and the timber industry, although still important, does not command the share of Shasta County's economy that it once did. In 2002, wood products had dropped to 32.3 percent of total manufacturing employment compared to 46 percent in 1990 and only represented 1.3 percent of total County employment, down from 4.5 percent in 1990. The number of wood products jobs was 35 percent less than in 1990.<sup>7</sup>

The strength and importance of Shasta County's timber industry may likely maintain a generally stable trend in terms of annual harvesting quotas as experienced over the past five years. Over the long term, nationwide and worldwide demands for timber products may rise faster than available supplies, and higher prices for such products may rise as well. Higher prices can have positive implications for the County as they tend to promote more intensive forest management practices and improved diversification and wider utilization of wood products.



Nationwide trends in the timber industry have been somewhat redefined during the 1990's and

include the following factors:

- Increased mechanization efficiency and labor-reducing mill technologies have resulted in increased production and volume while reducing labor needs.
- In certain areas, the harvesting of timber at rates which exceed the sustainable reproductive rate of the forest have caused concern for long-term supplies.<sup>9</sup>
- New environmental concerns are affecting timber harvests.
- Increased recycling of paper and wood products is expected to help reduce demand for timber and help balance timber reproduction at sustainable rates.<sup>10</sup>
- The shift of the timber industry to a more global orientation as a combination of the above trends increases in the Western states. From a land use planning perspective, the timberland supply is impacted due to the conversion of timberland to other land uses which are incompatible with timber operations and management. Such uses are most often associated with rural residential uses which limit efficient timber management. In addition, these land use activities and patterns can create situations where management for wildland fires is much more difficult, both for adjacent timberlands and within such forested rural residential areas. Additional loss of timber resources is attributable to parcelization into lot sizes inefficient for economic timber production. Negative impacts from forest practices may affect surrounding land uses and resources and create special management problems for timberland operations. Harvesting practices and the associated noise, dust, and traffic can be potentially damaging to air and water resources, wildlife

habitats, aesthetic enjoyment, and the health and safety of nearby residences, although state-required timber harvest plans are intended to mitigate timber harvesting impacts to acceptable levels. These problems can be magnified if incompatible land uses locate too close to one another. Therefore, it is in everyone's best interest that the General Plan employ effective measures to avoid and/or minimize land use conflicts as is feasible. The County has adopted an "agricultural and timber use" ordinance for timber resource areas to advise future property owners that where land divisions occur adjacent to a timber use area, they may be subject to impacts from the conduct of existing and future forest management-related activities that may be considered objectionable (Shasta County Ordinance No. 94-2).

Private timberland owners range from large corporations to operators of small woodlots and Christmas tree farms. While the land use objectives for large-scale timber operators are fairly evident, opportunities and incentives for smaller operators to optimize yields from their lands are considerably less. For this group, economic barriers to increased timber production and a limited knowledge of existing timber management opportunities pose serious impediments to increasing timber supplies. Greater production potential for this group may be realized, however, with increased public education through cost-sharing and/or technical assistance programs.

### 6.2.3 Objectives

T-1 Preservation of timberlands suitable for forest management and production to allow for the continuation of such uses or to provide opportunities for the future establishment of such uses. T-2 Protection of timberlands from incompatible adjacent land uses which adversely impact forest management activities.

### 6.2.4 Policies

T-a Preservation of timberland shall be achieved by the use of the Timberlands land use designation. This designation shall be applied to lands as follows:

- Lands now within a Timber Production Zone (TPZ) in accordance with the Forest Taxation Reform Act (hereinafter Act).
- Lands which may be eligible to enter into a TPZ in accordance with the Act.
- Lands not contained within either of the above categories which are suitable for timber production as shown on the adopted land use maps.
- Timber producing lands which are sold or traded to a private landowner by a federal or state agency.

T-b Timberlands within a TPZ shall be regulated as to use and subdivision as set forth in the Act. In addition to the permitted uses listed in the Act, other related and compatible uses may be conditionally permitted under applicable provisions of the Zoning Plan.

T-c Timberlands submitted for entrance into a TPZ in accordance with the Act shall be comprised of single or contiguous parcels whose resource value(s) and size(s) comply with

Table T-3.

### TABLE T-3

### TIMBER SITE CLASSIFICATION AND PARCEL SIZE REQUIREMENTS

Dunning's Site

Classification

Tree Height 100-yearold Site

Index

County Minimum Parcel Size Acres

I 114 feet, or more **40**

II 93 - 113 feet 60

III 75 - 92 feet 80

IV or V Less than 75 feet 80

Notes: (*County notes KC*)

Timberland is rated for productivity based upon its ability to produce wood growth for

trees. Five general site classes are established wherein Site I denotes areas of highest productivity, Site II and III denote areas of intermediate productivity, and Site IV and Site V denote areas of lowest productivity. The five site quality classes are set forth within each of three general forest types; redwood, Douglas fir, and mixed conifers. Table T-3 utilizes the mixed conifer class for Shasta County. Site index is based on average height of dominant trees at age 100 years. The Dunning system also includes 300 year age indexing for old growth stands.

**Source:** State Forest Practice Regulations, Article 4, Timber Site Classification Table. Also reference Revenue and Taxation Code Section 4341.

T-d Timberlands not within a TPZ shall be subject to the County development standards and to the following requirements as to their use and residential density. Use - The primary use of these lands shall be for forest management and production. Secondary uses may include uses which do not impede forest management or the processing or utilization of timber. Such uses include limited residential and recreational uses, mineral exploration and extraction and processing where the surface area will be reclaimed, power generation facilities, and small hydropower facilities. Density - Timberland may be developed at the maximum residential density of one dwelling per 40, 60 or 80 acres as shown in Table T-3 except, when 75 percent or more of the portion of the parcel proposed to be developed is in a Dunning Site Classification of IV or V and is within one-mile driving distance on a legal easement of a County paved road, the parcel may be developed at the maximum residential density of one dwelling per 10 acres. Re-existing legal parcels that are smaller than provided above may develop at a density of one dwelling per parcel, subject to County Development Standards. For proposed land divisions involving irregular survey sections the density may vary up to 5 percent but not more than that needed to adjust for the irregularity, whichever is less. Clustering - Developments on lands subject to a maximum density of the standards found in Table T-3 may receive a 100 percent density bonus if the residences are clustered on parcels not larger than 2 acres per residence to minimize conflicts with adjacent timber management activities on the remainder of the property.

T-e In order to protect timberland uses from incompatible land uses, lands being divided in areas designated either RA or RB and that adjoin lands designated for full-time timberland uses, shall comply with one of the following:

- If outside a rural community or town center, the minimum parcel size shall be ten acres or more depending on other policies and standards. Residential building sites shall be located, to the extent feasible, to avoid negative impacts on the adjacent land uses.
- If within a rural community or town center, the minimum parcel size shall be five acres or more depending on other policies and standards. Residential building sites shall be located, to the extent feasible, to avoid negative impacts on adjacent land uses.
- If it can be shown that topographic or man-made features will sufficiently separate the uses, the above-mentioned standards may be modified.

T-f The County should encourage and promote the utilization of **wood** waste produced in the County.

T-g The County should encourage and promote biomass thinning programs in timbered areas with extensive **rural** residential development for purposes of improving both tree vigor and wildland fire safety.

**Footnotes:**

1. Cooperative Extension - Forestry. University of California, 1979 Forestry Facts (for) Shasta County. Commercial timberland is defined as land capable of growing commercial tree species at a rate of 15 cubic feet per acre per year.
2. USDA, Forest Service, Pacific Northwest Research Station, Portland Oregon, Department of Forestry and Fire Protection, Fire and Resource Assessment Program.
3. Shasta County Assessor, 2004
4. Shasta Trinity-National Forest, Land Management Department. Actual Receipts FY 2002

5. "Annual Planning Information - Redding Area - 1991," California Employment Development Department (EDD).
6. Ibid., 2002, EDD.
7. California Board of Forestry. staff report and documentation associated with promulgation of emergency rules, Nov., 1991
8. "Recycling will reduce demand for timber, Forest Service says," Sacramento Bee, 12/5/91.

## **EL DORADO COUNTY**

Notes: These notes are excised quotes from the general plan below. Minimum parcel size for TPZ is **160** acres.

"Lands designated Natural Resource, excluding those zoned TPZ, generally located below **3,000** feet elevation that have been found to be suitable for producing commercial timber by the Board of Supervisors, after reviewing advice of the Agricultural Commission, shall have a 40-acre minimum parcel size unless such lands already have smaller parcels.

The subdivision of lands located adjacent to Natural Resource (NR) designation boundaries and lands zoned Timberland Production Zone (TPZ) shall not result in the creation of new parcels containing less than **40** acres. The subdivision of lands adjacent to NR designation and lands zoned TPZ containing 40 acres or less located generally below **3,000** feet in elevation may be considered for the creation of new parcels containing not less than 10 acres, as appropriate. Projects within Rural Center and Community Region planning concept areas are exempt from this minimum parcel size to encourage the concentration of such uses. A permanent setback of at least 200 feet shall be provided on parcels located adjacent to lands identified as timber production lands designated Natural Resource and/or lands zoned Timberland Production Zone (TPZ) shall not result in the creation of new parcels containing less than **40** acres. The subdivision of lands adjacent to **NR** designation and lands zoned TPZ containing 40 acres or less located generally below **3,000** feet in elevation may be considered for the creation of new parcels containing A permanent setback of at least **200** feet shall be provided on parcels located adjacent to lands identified as timber production lands designated Natural Resource and/or lands zoned Timberland Production Zone (TPZ)."

*El Dorado County General Plan Agriculture and Forestry Element*  
**Policy 8.4.1.2**

**Excerpts from El Dorado County General Plan Agricultural and Forestry Element:**

**FOREST LAND CONSERVATION AND PRODUCTION**

**GOAL 8.3: FOREST LAND CONSERVATION**

**Maintain healthy sustainable forests that provide for raw materials while limiting**

the intrusion of incompatible uses into important forest lands.

### OBJECTIVE 8.3.1: IDENTIFICATION OF TIMBER PRODUCTION LANDS

Identification of existing and potential timber production lands for commercial timber production.

Policy 8.3.1.1 Lands suitable for timber production which are designated Natural Resource (NR) on the General Plan land use map and zoned Timber Production Zone (TPZ) or Forest Resource (FR) are to be maintained for the purposes of protecting and encouraging the production of timber and associated activities.

#### *El Dorado County General Plan Agriculture and Forestry Element*

Policy 8.3.1.2 The procedures set forth in The ***Procedure for Evaluating the Suitability of Land for Timber Production*** shall be used for evaluating the suitability of forest lands for timber production. The procedure shall be developed and maintained by the Agricultural Commission and approved by the Board of Supervisors. Revisions to said procedure shall not constitute a General Plan amendment. These provisions shall be used in the following instances:

- A. To evaluate commercial forestry and timber lands within areas designated Natural Resource (NR) and/or lands zoned Timber Production Zone (TPZ) for their timber production value;
- B. To evaluate lands outside of areas designated Natural Resource (**NR**) and/or zoned Timber Production Zone (TPZ) for their timber production values for recommendation to the approving authority for inclusion within the Natural Resource designation and/or Timber Production Zone zoning district; and
- C. To evaluate lands designated NR and/or zoned TPZ generally located below 3,000 feet elevation for their timber production value.

Policy 8.3.1.3 The County Agricultural Commission shall assess lands to determine their suitability for timber production. Lands considered suitable for timber production shall be based on the following criteria:

- A. Lands designated Natural Resource (**NR**) on the General Plan land use map or lands zoned Timber Production Zone (TPZ);
- B. Soils identified as El Dorado County “choice” timber production soils which shall consist of soils found on Timber Site Classifications I, 11, or III as defined in the California Forest Handbook and the Soil Survey of El Dorado Area issued April 1974 by the USDA Soil Conservation Service and the U.S. Forest Service;

- C. Lands used for commercial forestry/timber production;
- D. Lands that possess topographical and other features that make them suitable for timber production; and
- E. **Low** development densities in vicinity.

### **OBJECTIVE 8.3.2: CONSERVATION OF FOREST LANDS**

Protect and conserve lands identified as suitable for commercial timber production within the County that are important to the local forest product industry and forest lands that serve other values such as watershed, wildlife habitat, recreation, hydroelectric power generation, grazing, mineral extraction, or other resource based uses.

- Policy 8.3.2.1 Lands zoned Timber Production Zone (TPZ) shall not be subdivided into parcels containing less than 160 acres.
- Policy 8.3.2.2 Timber production lands within areas designated Natural Resource and generally above 3,000 feet elevation shall maintain a 160-acre minimum parcel size or larger, except where smaller parcels already exist, in order to ensure the viability of long-term operations and to maximize economic feasibility for timber production or otherwise meet the parcel size requirements of the Natural Resource designation.
- Policy 8.3.2.3 Lands designated Natural Resource, excluding those zoned TPZ, generally located below 3,000 feet elevation that have been found to be suitable for producing commercial timber by the Board of Supervisors, after reviewing advice of the Agricultural Commission, shall have a 40-acre minimum parcel size unless such lands already have smaller parcels.

### **OBJECTIVE 8.3.3: LONG-TERM FOREST RESOURCES**

**Ensure long-term viability of forest resources and timber production.**

- Policy 8.3.3.1 Forest lands are reserved for multiple use purposes directly related to timber production, mineral resource extraction, wildlife, grazing, and recreation.
- Policy 8.3.3.2 The Natural Resource land use designation shall be applied for the purposes of conserving and protecting important forest lands and maintaining viable forest based communities. In determining whether particular lands constitute important forest lands, the Board of Supervisors shall consider the advice of the Agricultural Commission.

### **GOAL 8.4: SUSTAINABLE AND EFFICIENT FOREST PRODUCTION**

**Minimized constraints inhibiting sustainable and efficient forest resource production.**

**OBJECTIVE 8.4.1 : FOREST LAND BUFFERS**

**Provide for buffer parcels and setbacks between timber production lands and adjacent incompatible land uses.**

Policy 8.4.1.1 The subdivision of lands located adjacent to Natural Resource (NR) designation boundaries and lands zoned Timberland Production Zone (TPZ) shall not result in the creation of new parcels containing less than 40 acres. The subdivision of lands adjacent to NR designation and lands zoned TPZ containing 40 acres or less located generally below 3,000 feet in elevation may be considered for the creation of new parcels containing

*El Dorado County General Plan Agriculture and Forestry Element*

not less than 10 acres, as appropriate. Projects within Rural Center and Community Region planning concept areas are exempt from this minimum parcel size to encourage the concentration of such uses.

Policy 8.4.1.2 A permanent setback of at least 200 feet shall be provided on parcels located adjacent to lands identified as timber production lands designated Natural Resource and/or lands zoned Timberland Production Zone (TPZ). These setback areas shall be included in the zoning ordinance and shall be delineated on newly recorded parcel or subdivision maps. The Agricultural Commission may recommend a lesser setback to a minimum of 100 feet.

**Projects located within a Community Region or Rural Center planning concept area shall maintain a minimum setback of 50 feet. The 50-foot setback shall only apply to incompatible uses including residential structures. All setbacks are measured from the property line.**

**OBJECTIVE 8.4.2: DEVELOPMENT ENTITLEMENTS**

Policy 8.4.2.1 The County Agricultural Commission shall evaluate all discretionary development applications involving identified timber production lands which are designated Natural Resource or lands zoned Timberland Production Zone (TPZ) or lands adjacent to the same and shall make recommendations to the approving authority. Prior to granting an approval, the approving authority shall make the following findings:

**A. The proposed use will not be detrimental to that parcel or to adjacent parcels for long-term forest resource production value or conflict with forest resource production in that general area;**

- B. The proposed use will not intensify existing conflicts or add new conflicts between adjacent proposed uses and timber production and harvesting activities;
- C. The proposed use will not create an island effect wherein timber production lands located between the project site and other non-timber production lands are negatively affected;
- D. The proposed use will not hinder timber production and harvesting access to water and public roads or otherwise conflict with the continuation or development of timber production harvesting; and
- E. The proposed use will not significantly reduce or destroy the buffering effect of existing large parcel sizes adjacent to timber production lands.

## **IMPLEMENTATION PROGRAM**

### **MEASURE AF-A**

Review the Zoning Ordinance (Title 17 of the El Dorado County Code) to identify revisions that accomplish the following:

- A. Provisions that establish minimum densities of and setbacks on lands adjacent to agriculturally-zoned lands and timberlands to protect current and future agricultural and timber production on those lands as set forth below:
  1. 10-acre minimum parcel sizes adjacent to agriculturally-zoned lands [Policy 8.1.3.1];
  2. 200 foot setback adjacent to agriculturally zoned lands [Policies 8.1.1.5 and 8.1.3.2];
  3. 160-acre minimum parcel size for TPZ-zoned lands [policy 8.3.2.1];
  4. 160-acre minimum parcel size for Natural Resource-designated lands above 3000-foot elevation [Policy 8.3.2.2];
  5. 40-acre minimum parcel size for Natural Resource-designated lands below 3000-foot elevation [Policy 8.3.2.3];
  6. 40-acre minimum parcel size on lands adjacent to timberlands [Policy 8.4.1.1]; and
  7. 200-foot setback adjacent to timberlands [policy 8.4.1.2].
- B. Update and revise the Right to Farm Ordinance to include a requirement for a mandatory local option real estate transfer disclosure statement on all new parcels created adjacent to agricultural lands requiring the new owner to sign a statement acknowledging that his/her parcel is adjacent to a parcel engaging in agricultural activities and to protect forest management activities [Policies 8.1.1.5, 8.1.3.3, and 8.2.2.4];

- C. Provisions requiring alternative and/or supplemental findings for approval **for** special use permits to establish additional dwellings for permanent and seasonal agricultural employees [Policy 8.2.3.1];
- D. Provisions to encourage clustering of permitted residential development to minimize loss of choice agricultural soils [Policy 8.1.5.1];
- E. Provisions setting forth appropriate by right, and conditional use permit development to support the agricultural industry [Policies 8.2.2.1, 8.2.4.2, **and** 8.2.4.3]; and
- F. Standards for the construction **of** agricultural fencing on residential parcels adjacent to grazing lands [Policy 8.2.2.6].

<b>Responsibility:</b>	<b>Planning Department and Department of Agriculture</b>
<b>Time Frame:</b>	<b>Revise Zoning Ordinance within one year of General Plan adoption.</b>

## **Lassen County**

Notes: Minimum parcel size for TPZ is 160 acres or 40 acres if the 40 acre parcel is contiguous with one 160 acre TPZ parcel

### Lassen County Code

#### 18.70.050 Area.

The following minimum areas apply for proposed divisions of parcels zoned T-P-Z:

(1) One hundred sixty acres; or

(2) Forty acres, provided it is a part of at least one hundred sixty acres of contiguous timberland zoned T-P-Z for which a single joint timber management plan has been prepared by a registered professional forester, and such owners enter into a binding contract with the board to manage and harvest timber on the timberland jointly. (Ord. 467 § 71 (part), 1984).

#### 18.70.040 Qualifications for inclusion in T-P-Z district.

Land to be zoned T-P-Z must meet one of the following qualifications:

(1) Be parcels shown on List A or B as specified by the Z'berg-Warren-Keene-Collier Forest Taxation Reform Act of 1976; or

(2) Be parcels petitioned for inclusion which satisfy all of the following criteria:

(A) A map shall be prepared showing the legal description and the assessor's parcel number of the property desired to be zoned,

(B) A plan for forest management must be prepared or approved as to content for the property by a registered professional forester. Such plan shall provide for the eventual harvest of timber within a reasonable period of time, as determined by the preparer of the plan,

(C) The parcel shall currently meet the timber stocking standards and the forest practice rules or the owner must sign an agreement with the board of supervisors to meet such stocking standards and forest practice rules by the fifth anniversary of the signing of such agreement. Failure to meet the terms of the agreement will be grounds for rezoning,

(D) The area is in one ownership of at least forty acres or quarter-quarter section. This area must be contiguous or of parcels sufficiently near to each other to be manageable as a single forest unit,

(E) The average timber site of IV or higher, according to the site rating system of the state Board of Forestry. (Ord. 467 § 71 (part), 1984).

## **Mariposa County**

**Notes: Mariposa County has 2 forest zone districts neither allows subdivision to below 40 acres. Source county website.**

## **Plumas County**

**Notes: Plumas County established a minimum parcel size of 40 acres for lands classified as "Important Timber Resource Areas" Source Plumas General Plan**


87 Mount Madonna Rd.  
Watsonville, CA 95076  
March 18, 2007

Dear Santa Cruz County Planning Commission,

Re: Item #9 on agenda for March 28

I am planting redwood tree seedlings on my 25 acre (agriculture zoned) property. This is my legacy to my great-grand children and to future users of the renewable resource (lumber). I know it would require rezoning, but if I or my heirs can timber the property in the future, I can justify keeping it undeveloped as a nature preserve. If future timber income is not possible, I would develop the property immediately by seeking permits for housing.

Many other small tract owners are in the same situation as myself. If you raise the minimum tract size for rezoning to TPZ, you will actually be accelerating development of the small parcels. I urge you to keep the current 5 acre minimum size for rezoning to TPZ so that open space will be preserved.

Sincerely,   
David W. Rickert

RECEIVED  
MARCH 20 2007  
PLANNING COMMISSION

32

MARCH 17, 2007

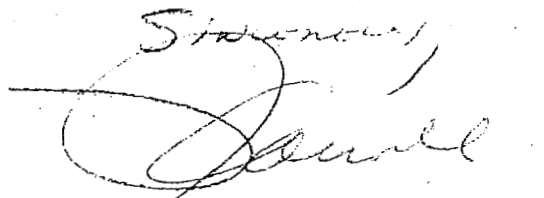
SANTA CRUZ PLANNING COMMISSION  
4<sup>TH</sup> FLOOR 701 OCEAN ST.  
SANTA CRUZ CA 95060

REFERENCE: Public Hearing Wednesday, MARCH 28, 2007  
ITEM # 4 ON THE AGENDA

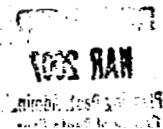
DEAR SANTA CRUZ COUNTY PLANNING COMMISSIONERS,

AS FORESTLAND OWNERS IN SANTA CRUZ COUNTY  
WE RESPECTFULLY RECOMMEND THAT THE MINIMUM  
SIZE FOR REZONING REMAIN AT 5 ACRES AND NOT  
BE INCREASED.

Your consideration in this matter will be  
deeply appreciated

Sincerely,  
  
Michael J. Cannon

  
Shirley J. Cannon



Santa Cruz County Planning Commission  
C/O SCC Planning Department  
4<sup>th</sup> floor, 701 Ocean St.  
Santa Cruz, CA 95060

March 27, 2007

RE: Item #9 on agenda of March 23,2007

I am not a timberland owner, I'm not in the timber business, and I have no vested interest in the subject of timber harvesting. I have followed the issues locally for more than 13 years, and became a forestry advocate and an advocate of forestland owners. This is due to the inordinate amount of mistruths and injustices served up by local "environmental" groups against timberland owners and responsible forestry.

A misrepresentation is found within the staff report for item #9, on page three of the cover letter, under the heading "Conclusion and Recommendation". In the second sentence, it is misstated "The adoption of policies and ordinances in 1998 to designate specific zone districts where timber harvesting is allowed was chosen as the answer after two attempts to modify the Forest Practice Rules to address environmental and community compatibility issues were stymied." This is not true.. It is important to correct this misconception regarding the State Board of Forestry. As stated within the recent CA Supreme Court Decision:

*"The procedure for submitting proposed rules to the Board of Forestry is no empty vessel; the Board of Forestry has in fact enacted more than 20 regulations proposed by Santa Cruz County, including rules relating to helicopter yarding. (Cal. Code Regs., tit. 14, § 926-926.25. [Santa Cruz County-specific logging rule]."*

Of additional concern is the addition of section 13.10.700-C "Compatibility Analysis". Unless it is the same as the Timber Management Plan currently required within an application to rezone to TPZ, this provides a potential avenue to place further conditions on rezoning to TPZ, contrary to state law and recent court rulings.

Another concern pertains to the omission within the staff report of discussion of subsection 16.20.180(h) – Design Standards for Private Roads, Driveways and Bridges. This was amended as part of the timber packages in 1999 within ordinance number 4578, and resolution 494-99. Therefore, it needs to be addressed within this language clean-up. After local Fire Chiefs expressed concern over the rocking requirements, several public hearings were held on the matter. On August 20, 2002, the County Board of Supervisors voted to make changes to the ordinance and to form a task force to further study the issue. This apparently has not occurred, and the changes adopted by the Board on August 20, 2002 are nowhere to be found. This ordinance does not pertain to timber harvesting and should be considered separately and with full environmental review.

Sincerely,  
Lisa Rudnick  
Ben Lomond. CA

March 28, 07 Agenda  
Item 9

The County intrusion into what is settled state. For a <sup>state</sup> practice is an exercise which wastes tax dollars. It takes time away from pressing county business, causes the expenditure of ~~money~~ money we do not have.

Please allow the "professionals" to do what they are trained to do. When your expertise exceeds that of the state, perhaps you can find time to do otherwise.

Please make no attempt to reduce the size of land that may be safely and economically harvested.

You have already made the best of a small harvest impossible for a small land owner to realize any return on investment.

Lowell Webb 32

Lowell Webb

March 28, 2007

To: Planning Commission  
County of Santa Cruz  
701 Ocean St.  
Santa Cruz, CA 95060

From: Catherine Moore  
1700 Eagle Tree Ln  
Felton CA 95018

Re: Agenda Item 9 of Planning Commission Meeting of March 28, 2007

Planning Commissioners:

I reviewed the package of documentation provided with this agenda item and found a dismaying number of inconsistencies in the package. The list of sections quoted in the cover letter do not match what is in the resolution which does not match what is in the Exhibit B list of code modifications.

I find this disturbing in that I'm not sure what the protocol is for a section mentioned and modified in the code which is not mentioned in the resolution authorizing it.

I found the following errors and omissions:

1. The cover letter mentions a section 13.10.395 when I believe 13.10695 was intended.
2. Exhibit B, Section 13.10.342(b) is missing from the resolution.
3. Exhibit B Section VI refers to Section 13.10.372(h) when the Resolution refers to 13.10.372(b).
4. The cover letter refers to only 13.10.375(c) subsections 7+8 but a good deal more than that was modified.
5. Section 13.10.375(a) changes introduces a new section, 13.10.700-C, which is not mentioned in the resolution, the resolution does not mention the repeal of Ordinance 457 as an action of the Planning Commission.

Thank you for your attention to these details.

32

6

Jan Beautz, Supervisor  
First District  
Santa Cruz County  
711 Ocean St.  
Santa Cruz, CA 95060

March 16, 2007

Dear Jan:

I am enclosing a copy of a peer-reviewed article I authored, entitled "Forest Management by West Coast Water Utilities: Protecting the Source?" which is published in the current edition of *the Journal of the American Water Works Association*. The article summarizes the results of my 2004 dissertation research.

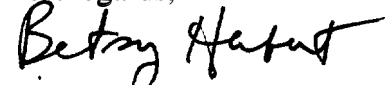
The article provides some evidence in support of additional watershed protection for drinking water supply watersheds. Mature forests play a vital role in producing clean, safe, drinking water. The federal Safe Drinking Water Act emphasizes protecting source water, because it is so cost effective. Water that is clean to start with is cheaper to treat. Minimizing watershed disturbance is a key element of protecting source water,

Santa Cruz County depends largely on its forested watersheds for drinking water, so it has an enormous stake in protecting these critical watersheds. For example, the Soquel Creek supplies water to 49,000 customers within mid-Santa Cruz County.

The 2006 Supreme Court decision affirmed the county's authority to restrict logging to appropriate areas, through zoning. The county's long and expensive effort to preserve its legal authority should now be used to full advantage to avoid increasing further impacts to water quality, as well as to avoid increasing conflicts in residential areas.

Currently, the county requires a minimum parcel size of 5 acres for rezoning to TPZ. This is absurdly small, in comparison to the 80-acre minimum parcel size required by most other timber-producing counties. The smaller the minimum parcel size required, the more acres will be available for logging, the greater the ground disturbance, and the greater the sedimentation of water. Therefore, I urge the county to increase the minimum parcel size for rezoning to the timber production zone to 80 acres.

Best regards,



Betsy Herbert, Ph.D.  
150 Thayer Rd.  
Santa Cruz, CA 95060

betsyherbert@comcast.net  
home: 831-423-2279  
work: 831-430-4627

# 32



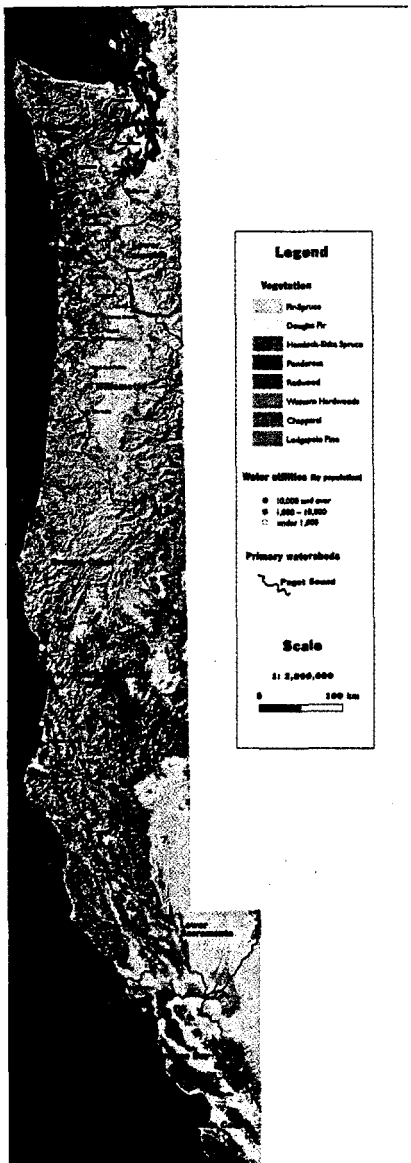
# Forest management by West Coast water utilities: Protecting the source?

SOURCE WATER PROTECTION  
IS NOT NECESSARILY THE SOLE  
FACTOR MOTIVATING WATER  
UTILITIES TO ACQUIRE  
AND MANAGE FORESTED LAND.

**M**ost water utilities nationwide that depend on surface water draw water from watersheds over which they have little or no control (Burby, 1983). Therefore, water utility managers view land acquisition as one of the most effective ways to protect water quality (Robbins et al, 1991). Because land acquisition can be costly, land trusts are increasingly using conservation easements to protect forest land (Barten & Ernst, 2004; Ernst et al, 2004).

This article summarizes the key findings of a research project that analyzed forest management policies and practices of 45 West Coast public water utilities that own forested land in their source watersheds (Herbert, 2004). The research includes three types of quantitative analysis and six case studies.

The primary research question driving this study was, "What is the variation in forest management policies and practices among West Coast public water utilities that own forest land, and what factors account for this variation?" If water utilities seek to buy land or acquire conservation easements in their forested watersheds to protect source water quality, then it is vital to consider how they manage this land once it is purchased. Public water utilities undeniably set an example for other land managers in terms of the importance of source water protection. Conservation easements to protect source watersheds therefore must be designed to protect forests from damaging forest practices as well as from conversion to other land uses.



This map shows the distribution of 45 public water utilities in coastal California, Oregon, and Washington that own forest land in their source watersheds.

## RECENT STUDIES EMPHASIZE LAND CONSERVATION

Emphasis on source water protection for public drinking water supplies has steadily increased since passage of the 1996 Safe Drinking Water Act (SDWA) amendments. Several recent studies have emphasized the value of conserving forest land to preserve source water quality (Barten & Ernst, 2004; Ernst et al, 2004; Dudley & Stolton, 2003). These studies have made a strong general case for pro-

tecting forest land from conversion to other uses, especially development and farming, and have suggested that forestry “best management practices” are useful. However, these studies have not specifically addressed the potential effect forest management practices have on water quality.

Earlier studies in source water protection showed that the potential effects from commercial logging and forest road-building are of concern to water utility managers in some regions. Burby (1983) found that 73% of water system managers in rural areas of the Pacific Northwest reported forest activities as a source of pollution, compared with only 37% of rural water system managers nationwide. Robbins et al (1991) stated that “most statewide regulations offer only minimal protection for riparian zones, specify limited public review periods, and do not address cumulative effects on a basin-wide level.”

A US Department of Agriculture Forest Service report, aimed at assisting states in assessing the potential effect human activities have on public drinking water supplies, devoted a chapter to forestry (Stednick, 2000). Road construction and other forest practices were identified as potential causes of erosion and stream sedimentation. Other studies from the natural sciences and ecosystem management literature have specifically addressed the ways in which forest operations can affect both ecosystem function and water quality (Ice & Stednick, 2004; Dunne et al, 2001; MacDonald et al, 1991; Reid & Dunne, 1984).

The study described in this article analyzed water utility forest policies and practices on the West Coast from 1986 to 2001. Although 15 years is a short period to observe forest management practices, most state timber harvest permit documentation was not available prior to 1986. In addition, this period was particularly interesting from the source water protection perspective. First, the traditional model of maximum

sustained yield was being challenged by a new model of ecosystem management (Cortner & Moote, 1999). Public opinion was shifting dramatically to recognize nontimber values provided by national forests, such as water, recreation, and wildlife habitat (Schaberg, 1998; FEMAT, 1993).

Second, federal legislative approaches to water quality protection were changing. The focus of the federal Clean Water Act began to shift from point source to nonpoint source pollution, opening the door for addressing watershed-wide pollution from human impacts, such as sediment and nutrients. In addition, the 1996 amendments to the SDWA initiated a new emphasis on source water protection, away from total reliance on expensive water treatment solutions. At the same time, local and state environmental groups strengthened their resolve in response to the weakening of federal laws and their enforcement during the 1980s (John, 1994). This period saw a marked rise in groups monitoring the health of watersheds, with an emphasis on pollution prevention, restoration, and protection of ecosystems (Kenney et al, 2000).

Environmental Protection Agency offices at the state level have generally designated state forestry departments as the management authorities for regulating forest operations that negatively affect water quality. Under state forestry law in the coastal regions of California, Oregon, and Washington, public water utilities that practice commercial logging are regulated as private timberland owners. In California, the state and regional water quality control boards have recently begun to reassert their authority to regulate the effect timber operations have on water quality.

## RESEARCH FOCUSED ON COASTAL RANGES OF WESTERN UNITED STATES

The research described in this article was limited to public water utilities that depend primarily on surface water, rather than groundwater,

from local watersheds within the coastal ranges of California, Oregon, and Washington, as shown in the map on page 92. All water utilities meeting these criteria were included in the study. The geographical boundaries of the study were selected to control for climate, terrain, vegetation type, and opportunity for timber extraction.

The coastal ranges fall within two adjacent coastal terrestrial and freshwater ecoregions as defined by Ricketts et al (1999). These ecoregions are described as “globally outstanding” in terms of biological distinctiveness, have been severely fragmented and affected by urbanization and logging, and are considered either endangered or critical (Ricketts et al, 1999).

The location of commercially valuable forest types within these ecoregions is closely related to terrain and climate. The northern coastal areas have significant stands of Sitka spruce (*Picea sitchensis*), western hemlock (*Tsuga heterophylla*), western red cedar (*Thuja plicata*), and red alder (*Alnus rubra*), which is the region’s principal hardwood (Kimerling & Jackson, 1985). To the east, Douglas fir (*Pseudotsuga menziesii*), western hemlock, western red cedar, and Sitka spruce dominate. The redwood region of California is in many ways an extension of the temperate rain forests of western Oregon and Washington, except that it is dominated by coastal redwoods (*Sequoia sempervirens*) in the foggier areas, and Douglas fir and hardwoods on the drier slopes (Ricketts et al, 1999).

### FOREST CONDITIONS IN STUDY AREA VARIED

Throughout the Pacific Northwest, the amount of old-growth forest has declined by more than 50% in the last 60 years, and what remains has become highly fragmented (Spies, 1997). Historically, fire was the dominant natural disturbance, which created a changing mosaic of different-aged forests. Currently, despite

sporadic catastrophic burns throughout the region, fire has been suppressed, and logging — primarily clearcutting — has become the dominant disturbance. Clearcutting developed as the primary silvicultural system throughout the region because it favored Douglas fir over more shade-tolerant and less valuable timber species and because it provided economic and operational advantages (Curtis et al, 1998).

Much of the forest land in western Washington and Oregon is occupied by relatively young seral stands that have followed clearing, logging, and wildfire (Franklin & Dyrness, 1988). In 2003, the Oregon Department of Environmental Quality completed its statewide source water assessments of watersheds that supply surface water to public water utilities. For 23 of the 24 Oregon water utilities in this study, the Department of Environmental Quality identified forestry operations as a potential contaminating source in their source watersheds. In some cases, the water utility owned nearly the entire watershed.

In Washington, approximately 200,000 acres (81,000 ha) are in county and municipal forests, mostly in the western part of the state. This area includes forests managed mainly for revenue from timber yields as well as “some large city watersheds where timber harvesting is limited” (USDA Forest Service, 1997). The Washington State Department of Ecology (1999) examined 78 streams in the Yakima River Basin and the Coast Range Ecoregion, finding that poor physical habitat conditions and impaired biological integrity were evident in both regions. Streams in both areas had “excessive sand and fine sediment and deficient large woody debris.” The agency ascribed these conditions to forest land uses because land use/land cover above streams in both regions was almost entirely forested.

In California’s coastal redwood region, only approximately 4% of presettlement old-growth forest remains, mostly in state and national parks. Eighty percent of the 5 million acres (2 million ha) of forested land on the North Coast is commer-



PHOTO: ELIZABETH HERBERT, 2002

Forest conditions varied significantly among the three West Coast states examined in this study, but unmaintained logging roads in the watersheds were a common source of contamination.



Many trees in no-cut riparian buffer zones on the city of Hoquiam's watershed property were blown down after the city's clearcutting exposed them to the wind.

cial timber land, with only approximately 10% in protected reserves (FRAP, 1998). Most of the streams in the redwood region have been declared impaired by sediment, and "public conflicts over forest management issues are escalating" (Thornburgh et al, 2000). In the coastal redwood region, the University of California Berkeley Forestry Center identified "almost a complete lack of data on water quality, streamflow, terrestrial biota, aquatic populations, the physical condition of

streams, components of the water balance, and the degree to which they are altered by timber harvest in the region" (Dunne et al, 2001).

#### RESEARCH FOLLOWED 'ENVIRONMENTAL POLICY CAPACITY' MODEL

The study was designed to assess the variation in forest management practices among West Coast public water utilities and to identify the factors that account for this variation. The unit of analysis was the com-

munity served by the water utility. The author hypothesized that—given similar climate and vegetation types, similar opportunities for commercial timber harvesting, and similar dependencies on local surface water—communities with certain enabling factors would produce both stronger forest management policies and better environmental outcomes. To assess the interrelationships among community factors, policies, and outcomes, the study used the "environmental policy capacity" model, which was developed to analyze the sociopolitical, economic, and natural land attributes of California counties that were relatively successful in preserving open space (Press, 2002).

#### Study factors included internal and external influences on community.

Factors for analysis were selected using the Press model (2002), and included external influences on the community, such as state and federal mandates and quality of natural resources; internal governmental factors, such as fiscal resources and administrative expertise; and community leadership factors, such as civic engagement and political organization.

#### Five forest management policies

were selected. The author reviewed resource management literature and selected policies for analysis that address forest practices that are widely acknowledged for their potential effects on water quality. Five policy areas were selected.

**Stream protection zones.** Streamside setbacks or buffer zones protect hydrologic and ecosystem function, as well as water quality (Naiman et al, 2000; Reid & Hilton, 1998; Abbe & Montgomery, 1996; Binkley & Brown, 1993; FEMAT, 1993). The federal Northwest Forest Plan provided the first science-based approach to riparian protection (FEMAT, 1993). The plan established no-cut/ no-entry zones of a distance equal to one tree-height on either side of streams to protect water quality, maintain appropriate water temperatures, and reduce sil-

tation and other degradation of aquatic habitat that results from timber cutting (FEMAT, 1993).

Although state forestry regulations in all three states now require some streamside buffers, these policies are not as restrictive as the Forest Ecosystem Management Assessment Team's policies and tend to provide less protection for the smaller headwaters streams, which, if disturbed, are potentially the greatest source of fine sediments (Welsh et al, 2000). The state of Washington requires 50-ft (15-m) no-cut zones around all types of streams in western Washington (Washington Administrative Code, 2005). The Oregon Department of Forestry requires 20-ft (6-m) no-cut zones along major streams (Oregon Administrative Regulations, 2006). In California, the Department of Forestry regulations require setbacks of 75–150 ft (23–46 m) along major streams but allow some cutting within the setbacks (CCR, 2006a).

**Forest road construction.** Trombulak and Frissell (2000) summarized the ecological effects of roads on terrestrial and aquatic communities. They warned conservationists not to depend entirely on mitigations and remediation measures to address the multiple ecological consequences of roads, concluding, "it is critical to retain remaining roadless or near-roadless portions of the landscape in their natural state." Luce and Wemple (2001) found that "the linear nature of roads and their tendency to run across topographic gradients yield an influence on watershed-scale hydrologic processes that is much greater than one might expect from the small fraction of the land that they occupy." Florsheim et al (2000) cite numerous studies that have documented "the link between roads, increased flow, and sediment production related to gullies, road surface erosion, and culvert failure in steep and forested areas."

**Rotation rate and silvicultural method.** Short rotations are the rule in commercial forestry, with stands

being clearcut every 30–50 years. Longer rotations are biologically suited to the Pacific Northwest because Douglas fir and its associates are long-lived (Curtis, 1997). Clearcutting results in even-aged stands. In some areas, individual and group tree selection is the standard silvicultural method. With these methods, stands may be entered more frequently. In Santa Cruz County, Calif., for example, the same parcel may be logged every 10 years (CCR, 2006b).

**Protection of old-growth forest reserves.** In addition to providing wildlife habitat, larger, older trees provide hydrological benefits and reduced soil erosion potential (Curtis, 1997; Harmon et al, 1986).

**Stream water quality monitoring.** The SDWA requires surface water systems to continuously monitor turbidity levels of raw water as it enters a plant. Water treatment specialists highly recommend source water quality monitoring throughout the source of supply (Reinert & Hroncich, 1990). Robbins et al (1991) emphasized that a source water quality monitoring program "is essential to proper management of a surface water supply" but found that 61% of sampled water utilities conducted no water quality monitoring of streams. Without well-designed stream water quality monitoring, it is difficult for water utility managers to track the sources of problems, including their own forest practices.

**Four indicators of ecosystem health were selected.** Choice of indicators of on-the-ground environmental outcomes of a water utility's forest management policies was limited by availability of data. There were insufficient data to assess source water quality, water treatment costs, and forest road conditions. However, on the basis of a review of scientific literature, four indicators of ecosystem health were selected.

**Old-forest reserve ratio.** A measure of forest ecosystem function, old-forest reserve ratio is calculated as the ratio of acres of protected old-growth forest to acres owned by the

water utility in the source watershed. Marcot (1997) emphasized that maintaining biodiversity of old forests in the West is necessary to preserve ecosystem functions. Press (2002) used the actual number of protected acres of old-growth stands as an indicator of positive environmental outcomes.

**Road density.** A measure of hydrologic disturbance, road density is the ratio of miles (kilometres) of forest roads to square miles (square kilometres) of forest watershed. Geographic information system (GIS) tools were used to calculate miles of forest roads on utility-owned land from state timber harvest plan and water utility maps. The National Marine Fisheries Service used road density as an indicator of watershed condition in formulating guidelines for salmon restoration on the Pacific Coast, designating road densities greater than 3 mi/sq mi (1.9 km/sq km) of watershed as an indication that the watershed is "not properly functioning" (NMFS, 1996).

**Predominant forest stand age.** A measure of forest ecosystem function, predominant forest stand age serves as an indicator of species diversity, with older forests generally demonstrating more biodiversity than younger ones (Marcot, 1997). Mature forests provide three ecosystem functions of direct relevance to water utility watersheds: (1) older forests have a higher capacity for intercepting fog and rain (FEMAT, 1993), (2) they maintain a low soil-erosion potential, and (3) they enhance channel stability by producing woody debris with longer retention times because of their size and resistance to decay (Harmon et al, 1986). Predominant forest stand age was estimated for each case study watershed in 2001 by consulting water utility forest management plans, forestry permits, and sanitary surveys; through interviews with water utility foresters; and by direct observation during watershed tours.

**Logging intensity.** Logging intensity is a good indicator of the level of

chronic land disturbance (Curtis, 1997). In this study, logging intensity was measured as the average annual percentage of utility-owned watershed acreage logged from 1986 to 2001. The larger the proportion of the land surface that is disturbed at any time and the larger the proportion of the land that is sensitive to severe disturbance, the greater the effects downstream (Dunne et al, 2001). The undisturbed forest with its understory, leaf litter, and organically enriched soil is the best watershed land for minimizing erosion by water (Dudley & Stolton, 2003).

### QUESTIONNAIRE SENT TO SELECT AND ANALYZE WATER UTILITIES

To select water utilities for inclusion in this study, a questionnaire was mailed in spring 2001 to 230 public water utilities that use surface water within the coastal ranges of the region. The contact list, obtained

from state department of health offices, was prescreened to select only water utilities that use surface water and serve communities of at least 200 people. The multiple-choice questions were designed to ascertain whether the water utility owned forest land, approximately how much land it owned, the uses for which the land was managed, and the other landowner categories in its source watersheds. After followup phone calls and repeated mailings, 45 water utilities were identified for the study.

Four types of analyses were conducted for this study:

- a descriptive analysis of all the water utilities in the study,
- a quantitative analysis to test the relationship between logging intensity and other variables,
- a quantitative community factors analysis, and
- a cross-case comparison of six in-depth case studies.

For the descriptive analysis, study questionnaire responses and public information were used to determine acreage owned, watershed size, and population served for each of the 45 utilities. The author used spreadsheets to organize and graph data and calculate the percentage of watershed owned.

For the quantitative analysis logging intensity was calculated for each of the 45 water utilities from state forestry permit data. Logging intensity was calculated as the average annual percent of the utility-owned acreage that was commercially logged from 1986 to 2001. Correlation coefficients were calculated to test the relationship between logging intensity and percent of watershed owned, acreage owned, and population served.

For the quantitative community factors analysis, questionnaire response data were tabulated and analyzed to identify community factors strongly associated with a utility's policy to either practice or not practice commercial logging. A statistical analysis was used to construct a profile of water utilities that practice commercial logging versus those that don't.

Six case studies were selected by identifying the most similar cases with different outcomes (Goodin & Klingemann, 1996). A pair of cases from each state was selected so that they were similar in terms of percent of watershed owned, acreage owned, population served, and economic resources, but most different in logging intensity. Cases were assessed in terms of community factors, forest management policies, and indicators of ecosystem health.

To assess community factors, more than 40 interviews were conducted with elected officials, water utility staff, and community leaders. To analyze forest management policies, the author consulted forest/watershed management plans, timber permits, and foresters. If a water utility had no written policy

**TABLE 1** Community factors associated with public water utility commercial logging

Factor	Commercial Logging	No Commercial Logging	Totals
Recreation allowed	7	9	16
Recreation not allowed	23	6	29
Total	30	15	45
Commercial timberland neighbor	26	8	34
Other neighbor types only	4	7	11
Total	30	15	45
Special district	3	10	13
City council	27	5	32
Total	30	15	45

Source: 2001 water utility questionnaire (Herbert, 2004)

**TABLE 2** Community factors associated with commercial logging by water utilities

Community Factor	0	1	2	3	Totals
No logging	6	2	4	3	15
Logging	0	2	10	18	30
Totals	6	4	14	21	45
Logging sites—%	0	50	71	86	

Source: 2001 water utility questionnaire (Herbert, 2004)

and it practiced commercial forestry, the state regulatory policy was used. To assess selected ecosystem health indicators, source water assessments, state forestry permits, water utility records, and maps were reviewed.

The author, accompanied by utility staff, toured and photographed each watershed. Each source watershed was mapped overlaying US Geological Survey aerial photographs. GIS technology was used to show acreage of timber harvests, roads, streams, and potential contaminant sources. Case studies were compared by community factors, policies, and outcomes.

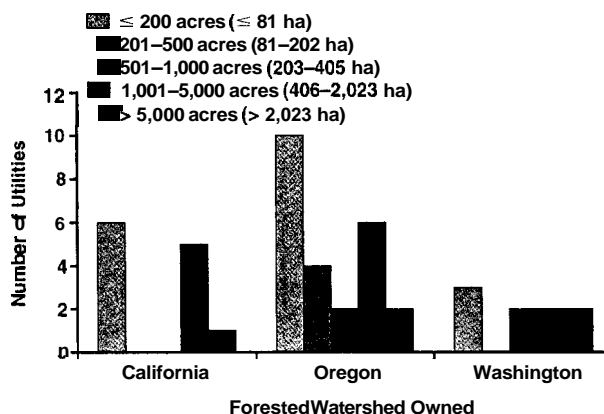
### RESULTS SHOW THAT COMMUNITY FACTORS AFFECT UTILITIES' LOGGING POLICIES

Figures 1-4 describe the 45 water utilities in terms of watershed acreage owned, percent of watershed owned, neighboring landowner types, and water utility land uses. Figure 1 shows the distribution of acreage owned by water utilities, ranging from 7.5 to 22,000 acres (3.0 to 8,900 ha). Nineteen of the 45 water utilities own 200 acres (81 ha) or less in the watersheds that supply their surface water, whereas 18 utilities own more than 1,000 acres (400 ha).

Figure 2 shows that 15 of the 45 water utilities own less than 5% of their source watersheds, whereas 9 of the 45 own more than 75%. Figure 3 shows that in Oregon and Washington, the most frequently reported category of neighboring landowner was private commercial timberland, followed closely by private residential. In California, the most frequently reported category was private residential, followed by an even mix of other landowner types.

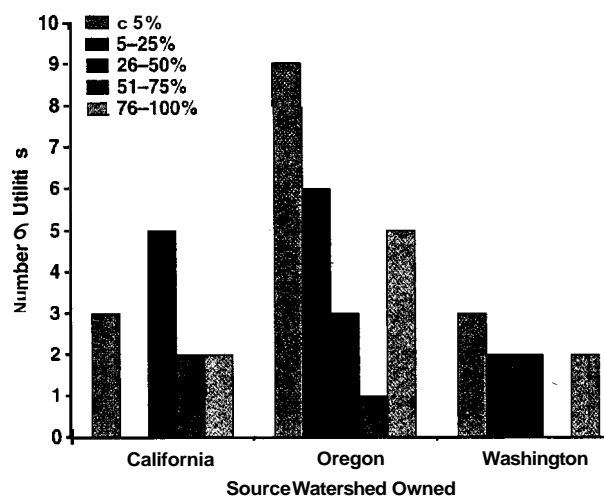
Regarding how water utilities manage their own lands, Figure 4 shows that in Oregon and Washington, the most frequently reported use on utility-owned land was timber harvest, whereas in California, the most frequently reported use was recreation.

**FIGURE 1** Forested watershed acreage owned by water utilities, by state



Source: 2001 water utility questionnaire, personal communication, state documents

**FIGURE 2** Percentage of source watershed owned by water utilities, by state



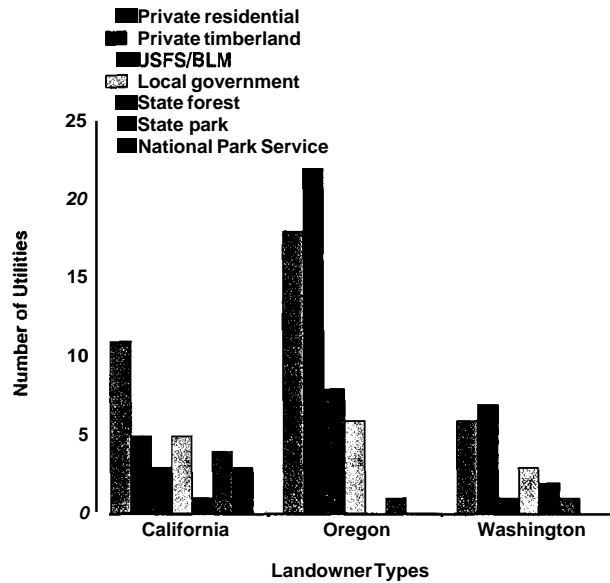
Source: Personal communication, state documents

Figure 5 shows the variation in logging intensity among the 45 public water utilities. Average annual acres (hectares) commercially logged ranged from 0 to 8.3% of acreage owned, with a mean of 1.6% and a standard deviation of 2.1%.

Figure 6 shows logging intensity by state. Six of the 12 water utilities in California had done no commercial logging from 1986 to 2002, compared with five of the 24 utilities in Oregon and three of the nine utilities in Wash-

ington. Four utilities in Oregon and one in California had logging intensities that averaged more than 5% per year during this period. (If a watershed was clearcut at the rate of 5% per year, in 20 years the entire watershed would be cut, leaving no tree older than 20 years.) No significant correlation was found between percent of watershed owned, acreage owned, or population served with logging intensity. The correlation coefficients had magnitudes of less than 0.25.

**FIGURE 3** Neighboring landowner types\* in water utility watersheds, by state

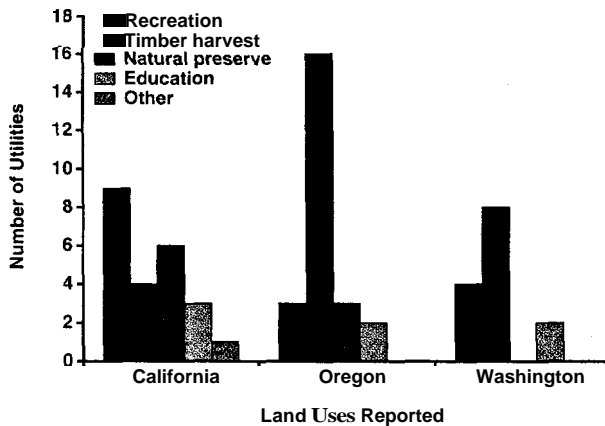


Source: 2001 water utility questionnaire (Herbert, 2004)

BLM—Bureau of Land Management, USFS—US Forest Service

\*As reported by 45 water utilities in this study; multiple landowner types often reported

**FIGURE 4** Types of uses\* on utility-owned land, by state



Source: 2001 water utility questionnaire (Herbert, 2004)

\*As reported by 45 water utilities in this study; multiple land uses often reported

Statistical analysis of the study's questionnaire responses identified community factors that are strongly associated with a water utility's policy to either practice or not practice commercial logging. Table 1 shows that among water utilities that report practicing commercial

logging, more than three times as many prohibit recreation in their watersheds as those that allow it. More than six times as many utilities have commercial timberland owners as neighbors as those that don't. Nine times as many utilities are governed by city councils as

those that are governed by special district boards.

Among water utilities that don't practice commercial logging, type of governance is the most important distinguishing factor. Twice as many water utilities in this category are governed by special districts as those that were governed by city councils.

Data from Table 1 were used to compute a score for community factors (C). In particular:

- if the utility allows recreational use of its land, then  $X = 0$ ;
- if the utility doesn't allow recreational use of its land, then  $X = 1$ ;
- if the utility is managed by a special district, then  $Y = 0$ ;
- if the utility is managed by a city council, then  $Y = 1$ ;
- if the utility has no commercial timberland neighbors, then  $Z = 0$ ;
- if the utility has commercial timberland neighbors, then  $Z = 1$ .

Using these values,  $C = X + Y + Z$  was calculated for each water utility. C has four possible values (0, 1, 2, or 3) as shown in Table 2. Similarly, a discrete value was assigned to commercial logging on the basis of the water utility's reported use or nonuse of commercial timber harvest as a land use. For example, Table 2 shows that six water utilities had a C value of zero, which means that these six utilities allowed public recreation, were special districts, and had no commercial timberland neighbors. Of those six utilities, none practiced commercial logging. At the other end of the scale, 21 water utilities had a C value of 3, which means that these utilities did not allow public recreation, were part of city government, and had commercial timberland neighbors. Of those 21 water utilities, 18 (86%) practiced commercial logging.

A chi-square analysis of these data found a strong relationship between these community factors and the water utility's policy regarding commercial logging. The resulting chi square statistic of 26.1, corresponding to a p-value of 0.001, allows rejection of the null hypothesis that

logging activity is randomly distributed with respect to these community factors. These results also indicated a need for further investigation to understand how these community factors and perhaps other factors not analyzed by this test influence water utility policy-making.

### CASE STUDIES DESCRIBE KEY FACTORS AFFECTING FOREST MANAGEMENT POLICIES

The following sections compare each pair of case studies selected from each state and describe key community factors that influenced the water utility's forest management policies and environmental outcomes.

**Brooktrails Township and Willits, Calif.** Although the city of Willits, Calif., logged its 2,927-acre (1,185-ha) forested watershed holdings intensively from 1986 to 2001, its neighbor, Brooktrails Township, did virtually no commercial logging on its 2,000-acre (810-ha) watershed lands. Both places inherited problems that were the result of mismanagement by previous landowners, and both places have struggled to find politically acceptable revenue sources for their water systems and watersheds within a transitional rural, timber-based economy. The community factors that most distinguish Brooktrails from Willits are visibility and public access to the watershed, type of governance, and effectiveness of local nongovernmental organizations (NGOs).

When the city of Willits bought its watershed lands in 1984, the previous landowner, Pacific Gas & Electric (PG&E), had logged the most valuable old timber from the watershed but had left some lower-quality harvestable timber (sometimes referred to as "high grading"). The state public utilities commission required by law that timber revenues be reinvested in the water system. However, shortly after the city acquired the watershed, the commission found that \$1.4 million of the timber harvest revenues realized by PG&E were never reinvested in the water system.



PHOTO: ELIZABETH HERBERT, OZ

Although fire has historically been the dominant disturbance in Pacific Northwest forests, logging—especially a practice called clearcutting that provides economic and operational advantages—has become the dominant disturbance in western watersheds.

As a result, when the city bought the property, it received a failing water treatment plant, a reservoir that was filling with silt, and a host of water quality problems. The state Department of Water Resources conducted a study of the Willits watershed that found that past logging had contributed to the water quality problems and recommended a reduction in watershed disturbance.

One month after purchasing the system, the city learned it would need a new water treatment plant and a new reservoir and began looking for ways to fund them. Recognizing the political liability of big rate hikes, the city council sought and received federal and state loans. To repay these loans, the city turned to its watershed timber revenues. The city contracted a local forester to write a forest management plan, which focused on maximum sustained yield of timber, and despite protests by several citizens, approved the plan, and proceeded with commercial logging. The opportunity to adopt a model of source

water protection had passed. Water quality protection would rely on expensive water treatment technology subsidized by resource extraction from the watershed. Source water quality problems documented by the Department of Water Resources continued, and high turbidities routinely placed high demands on the water treatment system.

Brooktrails Township was built in 1968 on the site of an old sawmill. The lands had been heavily cut over and crisscrossed with logging roads. The Brooktrails development plan focused on preserving redwood trees and open space, but a forest/watershed management plan was never implemented. The township's elected board proposed plans, but they advocated commercial logging to finance watershed restoration. The majority of Brooktrails residents were opposed to commercial logging, and these plans failed to be adopted. Residents feared that once commercial logging was allowed, timber revenues would drive the rate of cut.

**TABLE 3** Community factors assessed by case

Community Factor	California		Oregon		Washington	
	city of Willits	Brooktrails Township	McMinnville Water and light	city of Forest Grove	city of Ilwaco	city of Hoquiam
Percent of watershed owned	89.5				100	49
Land owned— <i>acres</i> (Fa)	2,927 (1,185)				935 (378)	5,360 (2,170)
Visibility	Low			Limited	Low	Limited
Public access	None			Limited	None	Limited
Age of forest stand at acquisition	0–125 years (1984)	(1968)		100+ years (1950)	0 years (1986)	30–50 years (1938)
Commercial timberland as neighbor	Yes	Yes	Yes	Yes	Yes	Yes
Governance type	City council	Special district	Mayor-appointed commission	City council	City council	City council
Mechanisms for citizen participation	None	Two citizen advisory committees	None	Three citizen advisory committees	None	None
Administrative expertise	Forestry	Forestry		Forestry, GIS	None	None
Number of local NGOs	1	–	–	4	2	2

GIS—geographic information system, NGO—nongovernmental organization

In the absence of a watershed management plan, forests were allowed to mature, but serious issues were left unaddressed. For example, the township’s paved road system, officially managed by the county, had failing culverts and miles of old, unmaintained logging roads that continued to erode. A typical old logging road is shown in the photo on page 93. The severity of this problem was not recognized until 2003, when the state Department of Health Services found that the township’s main reservoir had filled with so much silt that it had insufficient capacity to serve existing water customers. The Department of Health Services ordered the district not to allow any new water connections. Brooktrails residents must now decide how they will pay for fixing these failing roads. In 2006, after much public input, the Brooktrails board adopted a management plan that prohibits logging “for profit” or “to subsidize costs” of managing its forest land (Brooktrails, 2006).

Both the Willits and Brooktrails watersheds have compelling vistas and valuable native wildlife habitats. However, the Willits watershed lies 4

mi (6.4 km) outside of town and is closed to the public, whereas the Brooktrails watershed is immediately visible and open to its residents for passive recreational use.

In Willits, the only authorized watershed use is resource extraction. The main roads in the watershed are routinely used by trucks hauling gravel from the city’s gravel pit mine and periodically used by logging trucks. One resident stated that the community’s physical disconnection from its watershed was the reason most people in Willits haven’t objected to the logging and mining: “They aren’t allowed to hike in it, so nobody has a stake in it other than they drink the water. As long as they turn on the tap and it comes out, everybody is happy. It’s funny, one thing about the Willits watershed that I have noticed is that it’s always been this off-limits thing. People can’t go there.”

Brooktrails Township was designed to be integrated into its common forested greenbelt, with most of its developed areas below its source watershed. Access and visibility gave residents a stake in preserving recreation and aesthetic val-

ues. Still, degraded road conditions remained unaddressed.

The city of Willits provides water to 7,500 water users, 32% of whom live outside the city limits. Because only city residents are entitled to vote in city council elections, almost one third of Willits water users have no voice in how their water system or watershed is managed. However, local businesses have clout because they are the sole providers of sales tax, which is the lifeblood of the city’s general fund. Commercial businesses, including local sawmills, have maintained a strong representation on the city council. The council has remained committed to using timber revenues to finance the water system and has resisted forming a citizen advisory committee to address forest/watershed management issues. In Willits, the only group active in local environmental issues voiced concerns about watershed management to the city council, but the city council dismissed these concerns.

Brooktrails Township is a special district whose central function is to provide water to its 3,385 residents—it has no business customers and collects no sales tax. Its board of direc-

tors is elected by registered voters who reside or own property in the township. Thus, all water users in Brooktrails, unlike in Willits, have a voice in determining how their watershed is managed. The Brooktrails Board has routinely appointed residents to serve on voluntary advisory committees and has actively recruited citizens through newsletters and its web site. Residents have also organized a hiking club, which voluntarily maintains the greenbelt trails.

**McMinnville and Forest Grove, Ore.** Forest Grove and McMinnville are neighboring cities in northwestern Oregon, where the timber industry has declined but is still part of the regional economy. Although both cities own thousands of acres of forest land in their watersheds, they manage them differently. McMinnville Water & Light (W&L) has continued a timber program of maximum sustained yield for half a century. From 1990 to 2001, W&L clearcut 1,002 acres (400ha) and partially cut 1,827 acres (740ha) of its watershed lands, which is approximately 45% of its 6,572-acre (2660-ha) ownership. Its timber revenues have completely financed its complex water treatment and storage system. A W&L clearcut is shown in the photo on page 99.

Forest Grove also practiced intensive logging in its watershed but stopped in 1989 after a controversial clearcut outraged its citizenry. Forest Grove's city council placed a moratorium on logging that was lifted in 2001 after it appointed a citizen advisory group to create a forest plan on the basis of the ecosystem-management paradigm. The community factors that most distinguish Forest Grove from McMinnville are visibility and public access to the watershed, type of governance, public watershed access, and effectiveness of local NGOs.

The Forest Grove water department is governed by a city council. The director of public works administers the city's watershed lands and supervises a consulting forester. The city council has appointed two citizen advisory committees that were involved in the watershed planning process. The Committee for Citizen Involvement conducts the city council's annual town meeting and in 1997 published a handbook to enable citizen involvement in land use planning.

The Watershed Ad Hoc Committee was appointed by the Forest Grove City Council in 2000 to assist its consulting forester in creating a new watershed management plan.

The committee represented a cross-section of the community, including large commercial water users, a local university professor, environmental activists, and private timberland owners. The committee worked with the local branch of a statewide non-profit organization to recruit volunteers to remove nonnative, invasive species in the city's watershed.

W&L's water system is the most insulated from civic participation of all the case studies. Although the city of McMinnville has a typical mayor/city council form of government, W&L is directed by a unique five-member commission. The mayor serves as the commission's ex-officio chair and appoints the other four members. The commission makes all policy decisions that affect watershed management and is heavily weighted toward commercial business interests and large water users. The commission convenes monthly at open meetings.

W&L contracts with a consulting forester to manage the watershed. It continues to use its 1979 forest management plan, which is based on a model of maximum sustained yield of timber. In 1987, the mayor appointed a "Blue Ribbon" watershed committee, composed only of foresters

**TABLE 4** Forest management policies assessed by case

Policy Type	City of Willits	Brooktrails Township	McMinnville Water & Light	City of Forest Grove	city of Ilwaco	city of Hoquiam
Stream no-cut zones—ft (m)	None	25–50 (8–15)	20 (6)	100–200 (30–60)	None*	50 (15)*
Forest road construction	State	State	State	Decommission unused roads; skid trails, roads, and landings to be <10% of land area	State	State
Silvicultural method	Even-age, selection	Minor selection	Even-age, thinning	Even-age, thinning	Even-age	Even-age, thinning
Rotation age	50 years	No planned cutting	70 years	75–100 years	30 years	100 years
Old-growth forest protection	State and federal law	Identify habitats; protect, enhance, and restore biodiversity and native plants	State and federal law	Identify habitats; protect, enhance, and restore biodiversity and native plants	State and federal law	State and federal law
Stream water quality monitoring	None	None	None	Cites need for stream monitoring; no proposed program	None	None

\*Washington Department of Natural Resources did not require no-cut zones around streams until 2001

**TABLE 5** Ecosystem health indicators assessed by case

Indicator	City of Willits	Brooktrails Township	McMinnville Water and Light	City of Forest Grove	city of Ilwaco	city of Hoquiam
Average annual <b>percent</b> logged	5.5	0.1	3.6	0.3	6.7*	0.8
Acres (ha) of reserved old forest	0	76 (31)	0	790 (320)	0	0
Predominant forest stand age in 2001	0–45 years	35–165 years	0–70 years	40–100 years	15 years	80–90 years
<b>Road</b> density in mi/sq mi (km/sq km)	4.9 (3.0)	<b>8.7</b> (5.4)	5.1 (3.2)	4.7 (2.9)	7.9 (4.9)	<b>2.8</b> (1.7)

and an attorney who represented forest landowners, to review W&L's dependence on outside forestry consultants to advise the W&L Commission about forest management. The committee's report ensured that public participation would be kept out of the process: "It is our opinion that the independent nature of the consultants gives a certain 'freedom' from politics that allows the management recommendations being made to be on the basis of resource needs only (McMinnville Water & Light, 1988)."

Forest Grove's two major funding sources for its water system are water rates and system development charges (SDCs). Until 1989, Forest Grove subsidized both water user fees and SDCs with timber revenues to charge its customers lower water rates. After the logging moratorium in 1989, these low rates continued, and the city's water fund began to run a deficit. A citywide study conducted in 2000 showed that existing rates clearly favored large water users and provided no incentive to conserve water. Recognizing the problem, the city began raising water rates annually and changed its rate structure to provide conservation incentives. The 2001 Forest Grove watershed management plan estimated that 750,000 board feet of timber could be cut every year without damaging the ecosystem, providing estimated net revenues of \$200,000–\$250,000. The plan specified that "harvest levels shall be based on forest health and other ecological goals, and shall

not be revenue driven" (City of Forest Grove, 1994). This management philosophy is consistent with that applied to many eastern watershed forests (Barten et al, 1998).

W&L has had a longstanding policy of using timber revenues to subsidize water user fees and SDCs, enabling them to charge some of the lowest rates in the state. According to a recent W&L survey, the cost of annual water utility operations exceeded customer rate charges by \$1.3 million, with watershed timber revenues making up the difference. For many years, W&L gave volume discounts, which benefitted their largest water users. Recently, at the request of W&L's accounts manager, W&L has begun to bring water rates in line with operating costs. The accounts manager pointed out that if the utility's timber resource was lost in a forest fire, its main source of revenue would no longer exist, and banks would probably not lend the utility money. As such, the utility has moved incrementally to create incentives for water conservation.

W&L's timber revenues continue to subsidize SDCs, which are used to finance water system capital expenditures. One of the stated goals of its forest management plan is for timber in the watershed to provide "a source of revenue to defray existing and future capital expenditures" (Mason, Bruce, & Girard, 1979).

W&L has designed its water system to allow the utility to periodically drain the reservoir to repair the dam and remove silt and debris that

wash down from the watershed. W&L's water treatment plant was upgraded in 1997 at a cost of approximately \$1 million. But the utility will soon need to build a new water treatment plant at a cost of \$7 million–\$9 million, according to W&L's manager in 2002.

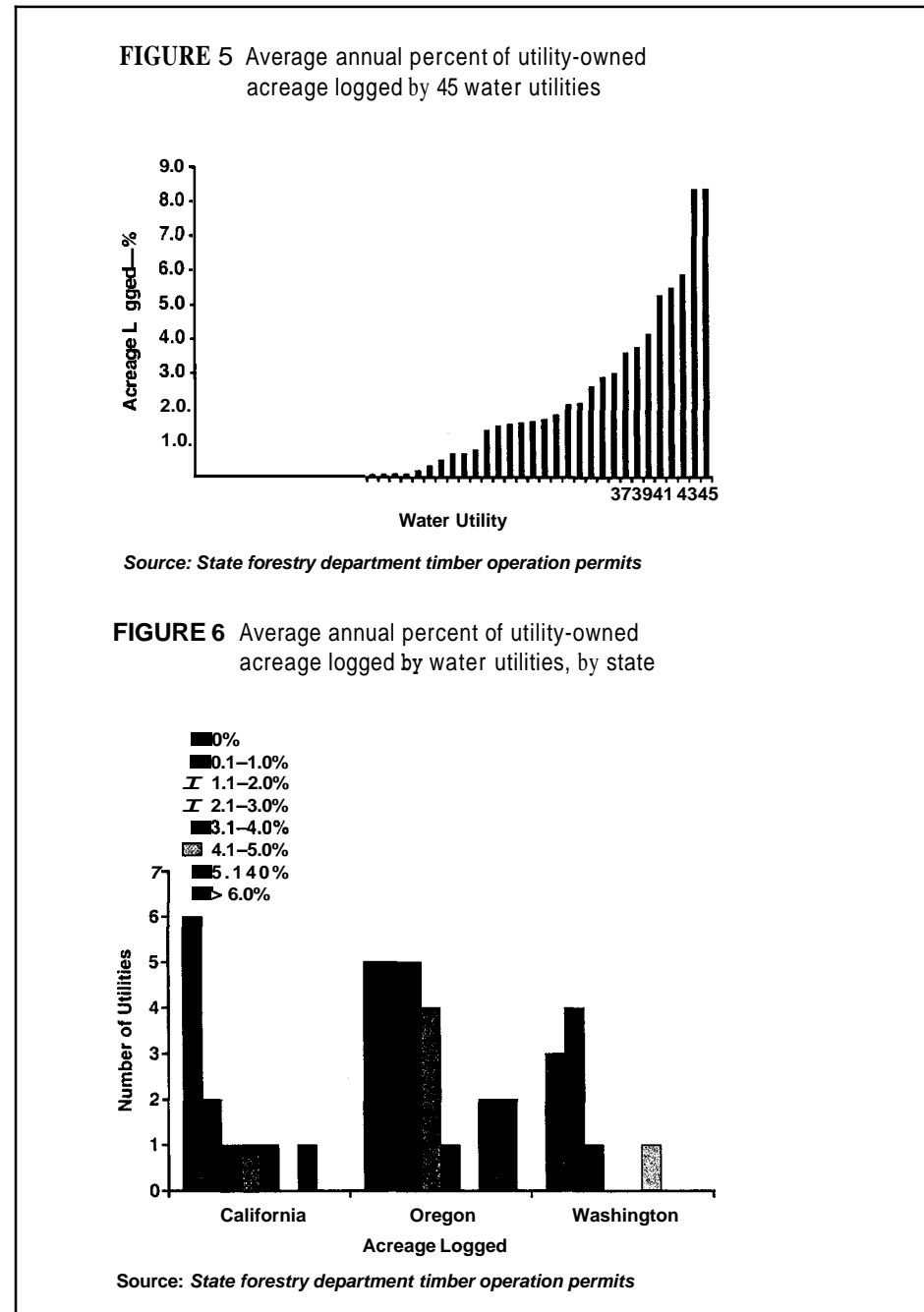
During the moratorium on city watershed logging from 1989 to 2001, Forest Grove's official policy was to keep the watershed closed to the public, except by special permission. In 1998, a professor at the local university received permission to take his students to the watershed to observe salmonid habitat. Following their hike, the students gave the city council a list of recommendations to improve salmon habitat, which included limiting logging on steep slopes and along streams, and fixing failing roads and culverts. They recommended that the city council focus on public education so that citizens could understand "that water consumption, capital expenditures for water treatment, and timber harvest in the watershed are closely connected." They also requested that the council "establish a Watershed Commission composed of a broad cross-section of citizens to advise the Council and review plans" and to "ensure timely and regular attention to the watershed" (Pacific Steelhead Project, 2000). This student tour eventually led Forest Grove to form the Watershed Ad Hoc Committee, which oversaw the drafting of the city's 2001 watershed management plan. The city continues to prohibit

general public access to the watershed, except for tours and volunteer restoration work.

In contrast, the W&L watershed has remained virtually off-limits to the public since the 1979 W&L forest management plan prohibited public access, ostensibly to protect water quality. In Forest Grove, citizen groups have used the forest management issue to win seats on their city council and to participate in the process of creating a watershed management plan to their liking. Citizens concerned about logging in the city's watershed helped initiate a grass roots movement to generally improve citizen involvement in government. In McMinnville, several residents noted that there wasn't much environmental organization in the city. Attempts by statewide NGOs to organize local groups tend to "fall apart after a year," according to one resident.

**Hoquiam and Ilwaco, Wash.** Once the center of the timber economy in the 1920s, the cities of Hoquiam and Ilwaco on the coast of Washington have struggled with economic hardships for years. State records show that Hoquiam logged an annual average of 0.8% of its 5,360 acres (2,170 ha) of watershed lands from 1986 to 2001, whereas Ilwaco conducted virtually no logging of its 935-acre (378-ha) watershed. Research revealed that Ilwaco had not done any logging simply because there was no timber left to cut. The city bought the land in 1986, just after it had been clearcut by timber companies. Hoquiam, however, acquired the bulk of its watershed land in the 1930s, and the forest still had significant stands of older western hemlock. The community factor that most distinguished these two cases was the age of forest stands at acquisition.

The Ilwaco case illustrates the problems confronting cities that have purchased cut-over forest land to manage as a public water source. When Ilwaco's previous water supply in town, Black Lake, became too polluted to treat in the 1970s, the city



needed to find another water source. In the late 1980s, it purchased the recently clearcut Indian Creek watershed from timber companies and built a reservoir and water treatment plant there. Old, unmaintained logging roads are still an apparent problem, and the city must now treat water from this degraded watershed to federal and state standards.

The forest stands in Ilwaco's watershed are now approximately 20 years old. Forest management may

become an issue when the forest is old enough to cut again, but it has not been on the city council agenda in recent years. Ilwaco's 1997 watershed control plan recommended that the city continue using "good forestry practices that meet current federal, state, and city standards" (Gray & Osborne, 1997). The plan apparently was recommending a continuation of the extensive clearcutting and road-building conducted by the previous landowners. The plan failed to men-

tion the aging forest road system or address the potential effects of this degraded watershed on water quality. At the same time it reported that “the raw water from Indian Creek contains variable amounts of turbidity, high iron, high manganese, and variable amounts of other organic compounds which complicate water treatment” (Gray & Osborne, 1997).

Although Ilwaco’s forest is young and even-aged, Hoquiam’s forest has many different age classes. According to Hoquiam’s 1994 watershed management plan, the city’s Davis Creek watershed property had 1,400 acres (570 ha) of SO-90-year-old forest, and its Little Hoquiam watershed property had nearly 600 acres (240 ha) of forest stands that exceed 90 years in age. In these older stands, increased vegetation along forest roads was associated with lower sediment levels in road ditches. Hoquiam’s management plan recommends reducing road density in its upper watersheds.

Both Ilwaco and Hoquiam have source watersheds that are located several miles outside of town. Ilwaco’s watershed is completely closed to the public. Hoquiam’s watershed is partly visible from the highway, where some of its older forests contrast sharply with the expansive clearcuts on nearby private land. Although Hoquiam’s policy generally prohibits public access, the city has made two exceptions that are compatible with the forest management plan’s recommendation to increase public education and access. First, the city allows ornamental greenery picking by local residents. Second, it buses local sixth graders to the watershed to plant trees. Though the city’s watershed management plan recommends keeping vehicular traffic to a minimum, Hoquiam allows an annual stock car road race in the city’s highest-quality watershed, Davis Creek. Although the race has proven controversial, the city council insists that it is harmless to the watershed (though no analysis has been done) and helps the city by attracting tourists.

Ilwaco has been much more successful in obtaining state and federal grant money than Hoquiam. Ilwaco has no harvestable timber and thus no timber revenue. It has financed its water operations and capital expenditures through water customer rates, SDCs, and state and federal funding. Ilwaco’s mayor credited the promise of a new housing development, which is expected to double the town’s population, with much of the city’s funding success. He expects this new development to bring in more tax revenue and SDCs to the city. At the same time, it will challenge the city’s infrastructure and water supply capacity.

Unlike Ilwaco, Hoquiam depends largely on timber revenues from its source watersheds to subsidize water and sewage treatment operating costs and infrastructure costs. Annual water and sewer revenues fall consistently below the city’s total expenditures for these utilities. Hoquiam’s dependence on timber subsidies has created an incentive to over-cut the watershed, even though its watershed plan, adopted by the Hoquiam city council in 1994, drafted policies aimed at preventing that. Recognizing the potential conflicts between exploitive logging and water quality, the management plan recommended continuing the 100-year rotation rate, which had been in effect since the city acquired the watershed. (A shorter rotation would result in an increased rate of cut that would likely increase sediment yield.)

The plan also advised limiting timber harvests by acreage rather than volume. A volume-driven rate of cut might result in cutting too much acreage to make up for low volume and thus adversely affect water runoff. The plan recommended limiting clearcuts to 20–30 acres (8–12 ha), not to exceed 55 acres (22 ha) per year. However, the Hoquiam city council has failed to follow those recommendations. The photo on page 94 shows the result of a clearcut on Hoquiam’s ownership.

Two other incentives exist to increase the rate of cut. First, Hoquiam

has used timber revenues both to guarantee bonds and get matching grants from government agencies. It received a state Clean Water Act grant to assist in silt removal from its reservoir, and another state grant to complete a watershed restoration project to reduce sedimentation caused by forest practices and road-building. (Hoquiam owns only half of its source watershed land. Timber companies own the other half, so their logging operations also contribute to the cumulative effects.)

The second incentive is the city council’s perception that the Endangered Species Act will eventually prevent them from harvesting their mature forest stands to protect spotted owl and marbled murrelet habitat. Most city council members expressed the need to cut these stands while they can. They recently hired a logger who shares this view, rather than a professional forester, to manage their forests.

#### **WATERSHED VISIBILITY INFLUENCED SUPPORT FOR BETTER MANAGEMENT PRACTICES**

Tables 3–5 summarize the results of the case study analysis in terms of community factors, forest management policies, and ecosystem health indicators. Table 3 shows that the community factors that most distinguished one case from another were public visibility of, and access to, the watershed; age of forest stands at acquisition; governance type; mechanisms for public participation; and number of local NGOs. The Forest Grove case demonstrated that even limited public access to a watershed, even when located miles outside of town, can spark civic enthusiasm for better forest management policies, especially if strong local environmental organization already exists.

Cases with more citizen involvement had larger no-cut zones around streams and protected existing old forests (Tables 4 and 5). In cases in which the watershed is completely off-limits to the public, water utilities

did not exceed state standards in terms of streamside buffer zones (Table 4), forests were logged more intensively, forests were younger, and there were no protected old-forest reserves (Table 5).

In all cases except Hoquiam, forest road densities exceeded the maximum specified for watershed health by the National Marine Fisheries Service (NMFS, 1996). No case had a source water quality monitoring program in effect within its source watershed.

## CONCLUSIONS

Although water utilities consider the acquisition of watershed lands to be one of the most effective ways to protect water quality, this study shows that source water protection is

not necessarily the sole motivation for acquiring and managing forested land. A conflicting motivation is access to timber revenues. A fundamental difference exists between maximum sustained yield of timber and forest management for water quality protection. Public water utilities that practice exploitive logging in their source watersheds increase watershed disturbance and risk affecting forest ecosystem functions that provide high-quality source water. Relying on timber subsidies from its own watershed lands—instead of charging realistic water rates—further disengages a water utility from its customers, its most dependable source of income.

Public access allows public scrutiny of forest/watershed man-

agement practices. However, water utilities that most heavily log their watersheds frequently keep them closed to the public, ostensibly to protect water quality. Still, an involved citizenry can turn exploitive forest management practices into those that protect water quality and sustain the ecosystem, while still allowing limited timber production.

Public participation in watershed planning is critical to the success of any source water protection program. City governments, which are more responsive to business concerns, tend to be more insulated from public participation than special districts, which are more responsive to residential concerns.

Two recommended policy changes would create incentives for more ef-

## REFERENCES

- Abbe, T.B. & Montgomery, D.R., 1996. Large Woody Debris Jams, Channel Hydraulics, and Habitat Formation in Large Rivers. *Regulated River Res. & Management.*, 12:201.
- Barten, P.K. & Ernst, C.E., 2004. Land Conservation and Watershed Management for Source Protection. *Jour. AWWA*, 96:4:121.
- Barten, P.K. et al, 1998. Massachusetts: Managing a Watershed. *Jour. Forestry*, 96:8:10.
- Binkley, D. & Brown, T.C., 1993. Forest Practices as Nonpoint Sources of Pollution in North America. *Water Res. Bull.*, 29:5:729.
- Brooktrails Township CSD, 2006. Final Greenbelt Stewardship Plan. [www.btcasd.org/brd\\_info/water\\_shed/final.php](http://www.btcasd.org/brd_info/water_shed/final.php).
- Burby, R.J., 1983. *Drinking Water Supplies: Protection Through Watershed Management*. Ann Arbor Science Publishers, Ann Arbor, Mich.
- CCR (California Code of Regulations), 2006a. Title 14, Sections 916.5, 936.5, 956.5. [www.oal.ca.gov](http://www.oal.ca.gov).
- CCR, 2006b. Title 14, Section 913.8. [www.oal.ca.gov](http://www.oal.ca.gov).
- City of Forest Grove, 1994. Watershed Resource Management Plan for the forest Grove Municipal Watershed. Pacific Forest Consultants Inc., Newberg, Ore.
- Cortner, H.J. & Moote, M.A., 1999. *The Politics of Ecosystem Management*. Island Press, Washington.
- Curtis, R.O., 1997. The Role of Extended Rotations. *Creating a Forestry for the 21st Century: The Science of Ecosystem Management* (K.A. Kohm and J.F. Franklin, editors). Island Press, Washington.
- Curtis, R.O. et al, 1998. Silviculture for Multiple Objectives in the Douglas-Fir Region. USDA Forest Service Pacific Northwest Research Station, Portland, Ore.
- Dudley, N. & Stolton, S., 2003. Running Pure: The Importance of Forest Protected Areas to Drinking Water. World Bank/World Wildlife Fund Alliance for Forest Conservation and Sustainable Use, Washington.
- Dunne, T. et al, 2001. A Scientific Basis for the Prediction of Cumulative Watershed Effects. University of California Committee on Cumulative Watershed Effects Report No. 46. University of California, Berkeley.
- Ernst, C.; Gullick, R.; & Nixon, K., 2004. Protecting the Source: Conserving Forests to Protect Water. *Opflow*, 30:5.
- FEMAT (Forest Ecosystem Management Assessment Team), 1993. Forest Ecosystem Management: An Ecological, Economic, and Social Assessment. Report of the Forest Ecosystem Management Assessment Team. GPO Pub. 1996-793-01, Washington.
- Florsheim, J.L.; Mount, J.F.; & Rutten, L.T., 2000. Effect of Baselevel Change on Floodplain and Fan Sediment Storage and Ephemeral Tributary Channel Morphology: Navarro River, California. *Earth Surface Processes & Landforms*, 26:219.
- Franklin, J.F. & Dyrness, C.T., 1988. *Natural Vegetation of Oregon and Washington*. Oregon State University Press, Corvallis.
- FRAP (Fire and Resource Assessment Program), 1998. The Land Base of California's Forests. California Department of Forestry and Fire Protection, Sacramento.
- Goodin, R.E. & Klingemann, H-D. (editors), 1996. *A New Handbook of Political Science*. Oxford University Press, England.
- Gray & Osborne Inc., 1997. City of Ilwaco Watershed Control Plan. Gray & Osborne Inc., Seattle.
- Harmon, M.E. et al, 1986. Ecology of Coarse Woody Debris in Temperate Ecosystems. *Adv. Ecological Res.*, 15:133.
- Herbert, E., 2004. Forest Management by West Coast Water Utilities: Influences and Consequences. Doctoral dissertation. University of California, Santa Cruz.
- Ice, G.G. & Stednick, J.D. (editors), 2004. *A Century of Forest and Wildland Watershed Lessons*. Society of American Foresters, Bethesda, Md.
- John, D., 1994. *Civic Environmentalism: Alternatives to Regulation in States and Communities*. QC Press, Washington.

fective source water protection and less reliance on timber subsidies. First, timber revenues should not be allowed as guarantees for loans for capital improvements and watershed restoration. Second, when land trusts purchase conservation easements to protect source water quality, these easements should require forest management practices that protect ecosystem functions, such as reducing road densities and establishing old-forest reserves and significant riparian no-cut zones.

#### ABOUT THE AUTHOR



**Elizabeth Herbert** is an environmental analyst with the San Lorenzo Valley Water District, 13060 Highway 9, Boulder Creek, CA 95006; e-mail [betsyherbert@comcast.net](mailto:betsyherbert@comcast.net). She has a PhD in environmental policy from the University of California at Santa Cruz, an MA degree from Northern Arizona University in Flagstaff, and a BA degree from

Beloit College in Wisconsin. Herbert received a Switzer Leadership Grant for a 2006 project to facilitate the public acquisition of the Felton water system in Felton, Calif. She also serves on the board of directors of the Sempervivons Fund, a nonprofit land trust that has preserved more than 21,000 acres of redwood forest.

If you have a comment about this article, please contact us at [journal@awwa.org](mailto:journal@awwa.org).

- Kenney, D.S. et al, 2000. *The New Watershed Source Book: A Directory and Review of Watershed Initiatives in the Western United States*. University of Colorado School of Law, Denver.
- Kimmerling, A.J. & Jackson, PL (editors), 1985. *Atlas of the Pacific Northwest*. Oregon State University Press, Corvallis, Ore.
- Luce, C.H. & Wemple, B.C., 2001. Introduction to Special Issue on Hydrologic and Geomorphic Effects of Forest Roads. *Earth Surface Processes & Landforms*, 26:111.
- MacDonald, LH; Smart, AW; & Wissmar, R.C., 1991. Monitoring Guidelines to Evaluate Effects of Forestry Activities on Streams in the Pacific Northwest and Alaska. US Environmental Protection Agency. EPA/910/9-91-001, Washington.
- Marcot, B.G., 1997. Biodiversity of Old Forests of the West: A Lesson From Our Elders. *Creating a Forestry for the 21st Century: The Science of Ecosystem Management* (K.A. Kohm, & J.F. Franklin, editors). Island Press, Washington.
- Mason, Bruce, & Girard Inc., 1979. *Management History and Forest Management Plan, Haskins Creek Watershed*. Mason, Bruce, & Girard Inc., Portland.
- McMinnville Water & Light, 1988. Description of Water & Light Committee Findings and Recommendations Regarding Watershed Management Status, Nov. 11.
- Naiman, R.J.; Bilby, R.E.; & Bisson, P.A., 2000. Riparian Ecology and Management in the Pacific Coastal Rain Forest. *Bioscience*, 50:11:996.
- NMFS (National Marine Fisheries Service), 1996. Coastal Salmon Conservation: Working Guidance for Comprehensive Salmon Restoration Initiatives on the Pacific Coast. National Oceanic & Atmospheric Administration, US Department of Commerce, Washington.
- Oregon Administrative Regulations, 2006. Water Protection Rules: Vegetation Retention Along Streams. Reg. 629-640. [http://arcweb.sos.state.or.us/rules/OARS\\_600/OAR\\_629/629\\_640.html](http://arcweb.sos.state.or.us/rules/OARS_600/OAR_629/629_640.html).
- Pacific Steelhead Project, 2000. Threatened Salmon in the Forest Grove Area. Memo to Forest Grove City Council. Pacific University, Forest Grove, Ore.
- Press, D., 2002. *Saving Open Space: The Politics of Local Preservation in California*. University of California Press, Berkeley.
- Reid, L.M. & Dunne, T., 1984. Sediment Production From Forest Road Surfaces. *Water Resources Res.*, 20:1753.
- Reid, L.M. & Hilton, S., 1998. Buffering the Buffer. USDA Forest Service. Gen. Tech. Rep. PSW-GTR-168, Washington.
- Reinert, R.H. & Hroncich, J.A., 1990. Source Water Quality Management. *Water Quality and Treatment: A Handbook of Community Water supplies* (F.W. Pontius, editor). McGraw-Hill, New York.
- Ricketts, T. et al, 1999. *Terrestrial Ecoregions of North America: A Conservation Assessment*. Island Press, Washington.
- Robbins, R W et al, 1991. Effective Watershed Management for Surface Water Supplies. AwwaRF, Denver
- Schaberg, R.H., 1998. Integrating Economic Trade-offs With Ecological Possibilities: Citizen Preferences for Ecological Goods and Services From Two South-eastern National Forests. Doctoral dissertation. North Carolina State University, Raleigh.
- Spies, T., 1997. Forest Stand Structure, Composition, and Function. *Creating a Forestry for the 21st Century: The Science of Ecosystem Management* (K.A. Kohm & J.F. Franklin, editors). Island Press, Washington.
- Stednick, J.D., 2000. Timber Management. *Drinking Water From Forests and Grasslands: A Synthesis of the Scientific Literature* (G.E. Dismeyer, editor). USOA Forest Service, Washington.
- Thornburgh, D.A. et al, 2000. Managing Redwoods. *The Redwood Forest: History, Ecology, and Conservation of the Coast Redwoods* (R.F. Noss, editor). Island Press, Washington.
- Trombulak, S.C. & Frissell, C., 2000. Review of Ecological Effects of Roads on Terrestrial and Aquatic Communities. *Conservation Biol.*, 14:1:18.
- USDA (US Department of Agriculture) Forest Service, 1997. Washington's Public and Private Forests. USDA Forest Service Pacific Northwest Research Station, Portland, Ore.
- Washington Administrative Code, 2005. Timber Harvesting. Section 222-30-021. <http://a.pps.wa.gov/WAC/default.aspx?cite=222-30-021>.
- Washington State department of Ecology, 1999. Biological Assessment of Small Streams in the Coast Range Ecoregion and the Yakima River Basin. Department of Ecology Publication No. 99-302, Olympia, Wash.
- Welsh Jr., J.H.; Roelofs, T.D.; & Frissell, C.A., 2000. Aquatic Ecosystems of the Redwood Region. *The Redwood Forest History, Ecology, and Conservation of the Coast Redwoods* (R.F. Noss, editor). Island Press, Washington



April 17,2007

Supervisor Jan Beautz  
County Building  
701 Ocean Street  
Santa Cruz, CA 95060

**RE: Minimum TPZ acreage**

Dear Supervisor Beautz,

Big Creek Lumber Company is a family owned business that has operated in Santa Cruz County since 1946. Our lands have been "green" certified under the Principles and Guidelines of the Forest Stewardship Council and the company has received both national and international recognition for our sustainable forestry practices.

We wish to convey our serious concerns regarding the possibility of raising the minimum acreage necessary to rezone parcels to Timber Production (TP). Your Board's passage of Santa Cruz County Ordinance No. 4577 (1999), restricting timber harvesting to a very few specific zoning designations, has resulted in significant economic hardship for our company, affecting its two hundred and sixty full time employees. During each of the years since the ordinance was passed, we have been unable to procure the amount of raw material necessary to run our sawmill at regular capacity.

This shortage has resulted in unplanned layoffs, causing direct economic hardship for a number of our employees. Every one of our employees depends upon a reliable source of material delivered annually to our sawmill. More than seventy percent of our employees are residents of Santa Cruz County and pay various kinds of county taxes. Additionally, Big Creek Lumber Company pays significant taxes annually, including sales taxes and property taxes directly to Santa Cruz County.

Private forest landowners also pay taxes to the County, including the Timber Yield Tax, which is assessed on the volume of timber harvested from their property. While this tax is paid to the state, the majority of the tax is returned to Santa Cruz County.

We sincerely believe that TP zoning, and the concurrent ability to conduct selective timber harvesting on lands so zoned, provides direct benefits to Santa Cruz County. Many private forest landowners use the periodic proceeds from selective timber harvesting to help pay taxes as well as help maintain and improve infrastructure on their properties.

Another significant benefit of TP zoning is the fact that these parcels are automatically subjected to intense environmental and regulatory review whenever the landowner files a state timber harvest plan (THP). By law, the filing of a THP sets in motion a thorough review of the project, including field visits by various state agencies.

Concurrent with the THP process is a separate regulatory review by the Central Coast Regional Water Quality Control Board. Timber Harvest Plans in Santa Cruz County are subject to a rigorous water quality monitoring program that is part of an application for a Waiver of Waste Discharge Requirements. This water quality monitoring requirement can include, but is not necessarily limited to; 5 years of visual, turbidity, temperature and forensic monitoring, as well as photo-point documentation. Selective timber harvesting is about the only land use that is subject to periodic environmental review and regulatory scrutiny.

The TP zone ensures that the parcel remains as forestland. It is extremely difficult to convert land out of TP once it is zoned such. TP lands create significant de facto open space in Santa Cruz County at no cost to taxpayers. Contrary to limited, cherry-picked data presented by local anti-logging activists, TP zoned lands do not change ownership often and are not a precursor to development. TP lands are restricted to single family residences and ancillary structures that, by law, cannot interfere with the growing and harvesting of timber.

Since the initial public discussions began in 1997, your Board has insisted that the primary objective was to get landowners to rezone their lands to TP if they wished to selectively harvest their timber. The County publicly encouraged forest landowners to rezone. This was emphasized on numerous occasions in the County's legal briefs and oral testimony before the Sixth Appellate Court and State Supreme Court. For decades, the minimum acreage necessary to rezone to TP has been set at five acres. To our knowledge, your Board never objected to this minimum acre size during the entire time it was encouraging forest landowners to rezone to TP. The only thing that has changed since 1997 is that the County prevailed on the issue they stated was most important: The County can prohibit timber harvesting on lands that are not zoned TP.

The implications of the legal decision in *Big Creek v. County of Santa Cruz* are considerable. More than 30,000 acres of privately owned non-TP zoned forestland are now off limits to timber harvesting. Planning Department information confirms that there has not been a huge rush by forest landowners to rezone to TP. The rezoning process is time consuming and considerably more expensive than when the County enacted Ordinance No. 4577 in 1999. Landowners must make a serious long-term decision to retain their parcels as forest. It is important to note that establishing a reasonable minimum acreage for TP rezoning does not mean that everyone eligible for rezoning will decide to do so. Instead, it is more likely that there will be a small number of landowners who decide to rezone in any year.

Nevertheless, the number of landowners who may be adversely affected by raising the minimum acreage is considerable. What the landowners lose is the ability to choose whether to rezone to TP and accept the considerable restrictions associated with that zoning designation.

Current County data indicates that there are 1,616 privately owned parcels 5 to 80 acres, comprising 23,203 total acres that have the Timber Resource Overlay and are not currently zoned to allow timber harvesting'. The previous Board of Supervisors never scrutinized these parcels to determine whether they qualified for TP zoning. These

---

<sup>1</sup> It is important to note that the Timber Resource Overlay is inaccurate and fails to include significant forestland acreage.

parcels are simply timberlands that were overlooked in the early 1970's when the County first undertook to implement TP zoning.

If the minimum acreage is changed to 10 acres, this would exclude 46% of the parcels and 22% of the acreage from having the ability to rezone to TP. If the minimum acreage is set at 20 acres, 81% of the parcels and 56% of the acreage will be excluded from the ability to rezone to TP. If the minimum acreage is set at 30 acres, 91% of the parcels and 73% of the acreage will be excluded from the ability to rezone to TP. If the minimum acreage is set at 40 acres, 95% of the parcels and 82% of the acreage will be excluded from the ability to rezone to TP. These figures do not take into consideration the forestland acreage not covered by the Timber Resource Overlay.

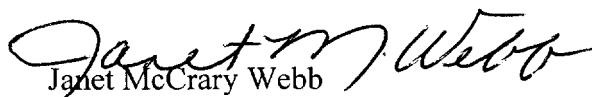
Over the past twenty years there have been a number of intentional exaggerations and misrepresentations leveled against timber harvesting in Santa Cruz County. There have been numerous allegations of environmental harm caused by selective timber harvesting. These allegations have come from a small handful of local anti-logging activists. After more than twenty years, they still remain nothing more than allegations. Selective harvesting has been the only harvesting method allowed in Santa Cruz County for the past thirty-seven years. No one has scientifically linked selective timber harvest in Santa Cruz County with environmental harm.

Another consistent misrepresentation is the so-called conflict between neighborhoods and timber harvesting. Big Creek Lumber has been selectively harvesting timber adjacent to neighborhoods in Santa Cruz County for nearly sixty years. Our company could not have stayed in business, nor could we have achieved our good reputation if we had ignored the concerns of neighbors.

It is a fact that the vast majority of concerns registered by neighbors occur before a timber harvest permit is granted. Over the years, we have received very few concerns during harvest operations and we have received almost no criticism after harvest operations have been completed. In other words, it is the fear of timber harvesting as opposed to the reality that has created concern. Some of this fear has been intentionally orchestrated by a small group who are opposed to all local timber harvesting.

In conclusion, the 5 acre minimum for TP rezoning has served the County well and would continue to do so. No legitimate need has been demonstrated to raise the minimum acreage. Big Creek Lumber Company urges your Board to continue to allow forest landowners to choose whether to zone their lands to TP. This is precisely what the County has said it wanted all along.

Sincerely,

  
Janet McCrary Webb  
Chief Forester

# Earth First!

**SANTA CRUZ**

**NO COMPROMISE IN DEFENSE OF MOTHER EARTH**

cruzef@cruzio.com www.earthfirst.org

20 April, 2007

Santa Cruz County Board of Supervisors  
701 Ocean St.  
Santa Cruz, CA 95062

Dear Supervisors,

Santa Cruz Earth First! strongly urges that you set the minimum acreage for conversion of forested land to TP zoning at 80 acres, the maximum allowed. Santa Cruz County is not a major timber producing area in California and logging is not the leading industry within this county. With nearly 25% of Santa Cruz County currently zoned for timber production, there is enough commercial forest land to sustain what timber industry still remains.

This county, under wise leadership, has the potential to return significant portions of forested land to a near pristine state. Small landowners have shown that they want to do this by refraining from cutting on their property. While Santa Cruz County does not currently do so, an Environmental Protection zoning should be established to give small property owners who put private land into conservation easements a substantial tax break. Until that is established, restricting zoning changes and logging to the largest parcels will help provide the same outcome.

Restricting Timber Production zoning to large parcels above 80 acres will give tax breaks to owners who truly want to put forest land into timber production. These owners have the resources to install and maintain the environmental protections that will prevent sediment runoff, reduce landsliding and protect water sources in Santa Cruz County. Studies show that old growth and mature forested land provides the best water quality and quantity year round. This county depends on forested watersheds to provide ALL of our water. It is imperative that logging be restricted to large parcels to help accomplish this.

Small landowners do not have the economic resources to fully protect forest lands subject to logging. They tend to log a higher percentage of their parcels, have more roads and skid trails per acre of production, get a lower economic return on the timber they sell because of overhead and therefore cannot provide the long term environmental protections required to maintain water quality.

Your immediate action to restrict rezoning to TP zoning to parcels of 80 acres or larger will go a long way to preserving and restoring forests in Santa Cruz County.

Thank You,

Santa Cruz Earth First!

Santa Cruz Earth First! is a grassroots, Non-violent Direct Action group dedicated to defending, preserving and restoring wilderness and biodiversity in our local bioregion since 1982.

# fer De Lance

a *Jeanneau 47 Sunkiss*

Dennis and Sandy Davie  
POB 651, Capitola, CA 95010

20 April, 2007

Santa Cruz County Board of Supervisors  
701 Ocean St.  
Santa Cruz, CA 95062

Dear Supervisors,

We strongly urge that you set the minimum acreage for conversion of forested land to TP zoning at 80 acres, the maximum allowed. Santa Cruz County has successfully battled logging interests and obtained a CA Supreme Court ruling that upheld the rights of every county in California to restrict where logging can take place. Please continue on with this important effort to protect this beautiful area from the continued loss of forested land and support the regrowth of mature forests with old growth characteristics, so necessary to returning this area to the state of biodiversity we lost over the course of history.

This county has shown that it cares about the quality **of** life for residents and the environment. Industrial logging does not belong in neighborhoods. The noise, air and water pollution, traffic and sediment runoff that result from logging is not what most county residents want to occur near their homes. Small parcels tend to occur in areas with more neighbors. Please help keep the quality of life that many came here to find.

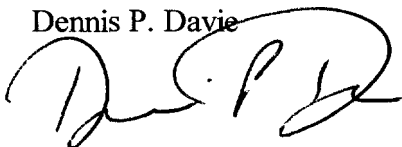
Santa Cruz County depends on property taxes as an important source of income. Rezoning to TPZ significantly reduces the amount of property tax that the county will receive each year on a TP zoned parcel compared to one that is not zoned TP. While TP zoning makes sense for large parcels devoted to timber production, smaller parcels tend to have higher housing densities per acre and, therefore, a higher need for county services. The county should not allow these parcels to be rezoned and reduce the county tax revenues.

Small landowners do not have the economic resources to fully protect forest lands subject to logging. They tend to log a higher percentage of their parcels, have more roads and **skid** trails per acre of production, get a lower economic return on the timber they sell because of overhead and therefore cannot provide the long term environmental protections required to maintain water quality. The county's zoning should restrict logging to large parcels to ensure that these needed protections can be established and maintained.

Your immediate action to restrict rezoning to TP zoning to parcels of 80 acres or larger will go a long way to preserving and restoring forests and neighborhoods in Santa Cruz County and keep county finances healthy.

Thank You,

Dennis P. Davie



Sandy E. Davie

**David Reetz**

---

**From:** Catherine Moore [cateymoore@mac.com]  
**Sent:** Tuesday, April 17, 2007 10:33 PM  
**To:** Jan Beautz; Ellen Pirie; Mark Stone; Neal Coonerty; Tony Campos  
**Subject:** Hearing on the minimum size for **TP** zoned lands

April 17, 2007

Santa Cruz County Board of Supervisors  
701 Ocean Street  
Santa Cruz, CA 95060

**RE: Hearing on TPZ acreage limitation.**

Dear Supervisors:

The County of Santa Cruz has talked big for many years about how much value it places on "open space". One gets the impression there could be nothing finer than wide expanses of undeveloped land in the County's view. Here is a golden opportunity to make good on these goals.

The best way to maintain open space is to make it profitable for the owners of that space to leave it in that condition. It creates an incentive. In a government's toolbox, the most expedient tools are tax structure and zoning rules. Using these tools you can make it profitable and desirable to leave land as open space. The most effective "open space" zoning is TP; the land remains in private hands, which relieves government from the burden of maintaining that land; it remains on the tax rolls; it is nearly impossible to use the land as anything other than open space. The whole point of the zoning is to leave the land as open space for timber production (aka "growing forests").

A TP zoning is not a carte blanche to harvest timber; all of the timber harvest regulations and requirements must still be met before any timber moves. The County of Santa Cruz lies in the CDF Southern Subdistrict, which only allows selective harvests on a ten year or longer rotation. Thus, the rezoning of a property does not mean the owner is going to immediately run a timber harvest, he merely retains his right to do so some time in the future. Nor is it easy to cut timber and rezone back to a non-timber zoning. Once you are in TP, the land must remain forest land; it is very hard and expensive to change out of TP. Check your records; just how many parcels do you have recorded that have changed from TP to another designation?

When people buy a parcel of land, they check its zoning designations to learn what they may do with that land. In the past, parcels of zonings other than TP were still able to harvest timber, and many of those owners want to keep that option. A timber harvest can provide the money to pay for the land's expenses or put in needed improvements, such as fish-friendly stream crossings or erosion control measures. A timber harvest can reduce fuel loads and improve fire safety for the area.

#32

4/18/2007

People who zone their land TP are dedicated to maintaining their land as open space. They don't want to subdivide or build commercial tracts; they don't want to grow row crops. If the County is truly interested in maintaining its open space, it will make it easy for these people to achieve their goals, not continue to throw up road blocks.

Thank you for your attention.

Sincerely,

Catherine Moore, landowner  
1700 Eagle Tree Lane  
Felton, CA 95018



(5) Videotape, photograph or other means of documentation for noting the existing conditions of the road.

(b) The RPF shall provide a map showing the location of the flagged property boundaries along with any documentation that substantiates -the property line.

(c) The description of the plan area shall include the County Assessor Parcel Number(s) for those parcel (s) within which timber operations are to be conducted.

(d) The RPF shall include within the notice to the landowner section of the plan the following statement: "Section 16.22.030 of the County Code states that any road or bridge constructed pursuant to a Timber Harvest Permit issued by the State of California, if used to serve purposes other than forest management activities shall be considered new and shall be subject to all County design standards and applicable policies including County grading and bridge permits."

?

I include this specific rule since misinformation has been provided to the Supervisors on this issue of access.

?

Also, I notice on the Planning Commission agenda for April 25th, an item affecting land use on rural properties of 10 acres and less. This "groundwater recharge" item was before the Board of Supervisors previously, so they should be familiar with the more stringent regulations currently being crafted which may affect the property rights of rural land owners. This too should be considered as pertinent to the timber discussion.

3

Smaller properties with a zoning such as "Special Use" which have long carried a higher tax rate in order to be allowed additional uses of their private property should be fully compensated for any loss of property value as well as refunded the amount of the higher tax rate if their right to rezone to TPZ is eliminated.

?

The majority of smaller forested parcels in this county are owned by individual families. These families will be greatly impacted by any increase in the acreage size required in order to rezone to TPZ. For many families, their trees are their savings account. Additionally, it is through a selective timber harvest that roads and culverts are upgraded, and necessary fuel reductions can occur. Once zoned as TP, it is extremely difficult to change the zoning for a different use, contrary to popular urban legends.

?

Lastly but most importantly, all landowners who are potentially affected by any proposed change in policy should be notified by the County of Santa Cruz of all public hearings on this issue. This obligation should not fall onto the shoulders of private citizens.

?

Sincerely,

?

Lisa Rudnick  
Ben Lomond, CA

**David Reetz**

---

**From:** maryanne murphy [themislaw@msn.com]  
**Sent:** Monday, April 16, 2007 9:01 AM  
**To:** Jan Beautz  
**Subject:** TPZ zoning

Dear Supervisor, I am amazed that TPZ is even being considered in the age of "climate change". I endorse the efforts of the Sierra Club and the recommendation made by the club. After all of the gains made in controlling the impact of logging in the county, to let the gameplan of the logging industry win now would not speak well of the Board for the people. You have the power to change the lives of all residents of Santa Cruz County on this issue, please preserve our way of life here, it is unique in the world and precious. Maryanne Murphy

**David Reetz**

---

**From:** Vikki Pachera [vikki.pachera@gmail.com]  
**Sent:** Tuesday, April 17, 2007 9:57 AM  
**To:** Jan Beautz  
**Cc:** Steve Stewart; Bill Lard; corwinh@msn.com; Neil E Wiley; Kevin McKinney  
**Subject:** Santa Cruz Logging

Supervisor Beautz:

As members of Summit Watershed Protection League, we've been meeting and discussing the problem of residential logging for years. Our properties surround Burns Creek in the Villa Del Monte and neighboring communities.

We applaud the county concern for the issue of commercial logging in and around our rural neighborhoods and in particular the rezoning work that was done over the past years. Clearly logging adjacent to homes where over sized trucks and helicopters will inevitably come too close to our homes, children, pets and property will put all in harms way. Additionally, the topography of the Santa Cruz Mountains puts all of our properties at substantial risk of slides when the trees securing the hills are removed. Wind can be another factor in further reducing trees in that parcel further subjecting it to slides and damage.

We understand that there is currently debate over the minimum size of the parcels that can be rezoned TPZ.

While the overall size of the parcel is certainly one factor, we believe this does not sufficiently solve the risk of injury and property damage as it does not fully take into account the proximity to other property on the logged parcel's perimeter.

The notion of setbacks, following San Mateo's example of a 'Timber Buffer' zone on TPZ property (1000 feet) is logical and reasonable.

We strongly encourage the council to consider this as a partial solution to this problem.

Best Regards,

Vikki Pachera  
Allan Erbes

#32



B

Santa Cruz Group of the Ventana Chapter  
PO Box 604, Santa Cruz CA. 95061 831-426-4453  
[www.ventana.sierraclub.org](http://www.ventana.sierraclub.org)  
[santacruzstaff@ventanasierraclub.org](mailto:santacruzstaff@ventanasierraclub.org)

April 17, 2007

Supervisor Jan Beautz  
Santa Cruz County  
County Building  
701 Ocean Street  
Santa Cruz, CA 95062

Re: TPZ - increase of minimum parcel size

Dear Supervisor Beautz,

This letter is being submitted on behalf of the Santa Cruz Group of the Sierra Club regarding the upcoming item on your April 24<sup>th</sup> agenda on raising the minimum acreage size required to rezone parcels to Timber Production Zone (TPZ). The Sierra Club has given much thought to this issue and presents the following recommendations with supporting facts and figures.

First, we would like to ask you and your Board to approve an increase of the minimum parcel size for rezoning to TPZ to 80 acres, the maximum allowable under the Timberland Productivity Act (**TPA**). Secondly, we believe the County should use the definition of 'parcel' as defined in the TPA, or *'that portion of an assessor's parcel that is timberland as defined'* Use of this definition does not require the County to apply multiple zone designations to any given Assessor's Parcel, but would require a minimum amount of timberland be present to qualify for rezoning to TPZ.

The definition of 'Timberland' per the TPA "means privately owned land, or land acquired for state forest purposes, which is *devoted to and used for growing and harvesting timber*, or for growing and harvesting timber and compatible uses, and which is capable of growing an average annual volume of wood fiber of at least 15 cubic feet per acre." (emphasis added). We suggest that the county could and should require that any new lands to be rezoned to TPZ be "devoted to and used for growing and harvesting timber" as indicated by previous approved timber harvest plans. Any parcel that does not meet this criterion can be deemed to not meet the state definition for rezoning.

We have heard the arguments that we are trying to put the timber industry out of business, that we are opposed to all logging, that development causes worse problems than logging and that TPZ protects land from development. We provide the following discussions to discredit those arguments.

#<sup>1</sup> 32

We include data below (provided by your Planning Department) to show that more than 72,000 acres of mapped timberland are currently available for logging in Santa Cruz County and an increase in the minimum parcel size for rezoning (even up to 80 acres) can't lower this number. We are not opposed to all logging, but continue to have concerns about how some logging is done in this area. Logging is just one industry/land use in Santa Cruz County, along with agriculture, tourism, commercial use, light industry and residential use. Santa Cruz is a significant bedroom community to Silicon Valley, and is also home to a top-notch state University (UCSC) and a quality community college (Cabrillo College). We are physically constrained by the Monterey Bay and the Santa Cruz Mountains. In order to accommodate multiple uses, conflicting uses must find a way to co-exist or cease.

All of Santa Cruz County's drinking water comes from our own forested watershed lands. We have an obligation to protect our water quality and quantity as water becomes more scarce and as Global Climate Change brings about more uncertain weather conditions, including drought and floods. Scientific data shows that adequate tree cover protects both the quantity and quality of water produced within those forested areas. "Mature forests provide three ecosystem functions of direct relevance to water utility watersheds; (1) older forests have a higher capacity for intercepting fog and rain (FEMAT, 1993), (2) they maintain a low soil-erosion potential, and (3) they enhance channel stability by producing woody debris with longer retention times because of their size and resistance to decay (Harmon et al, 1986)

Local timber harvest regulation allows for harvesting every ten years. Loggers prefer to remove the larger trees from the forest for obvious economic reasons, opening up the canopy in the process, increasing run-off during the winter period and allowing the generally moist forest floor to dry out. Slash (limbs and tops), a by-product of tree removal equivalent to kindling, is left in place up to three feet in depth, increasing fire hazard in our heavily urbanized residential mountain areas.

Selection silviculture requires an extensive road system which is used in successive harvests. Research indicates that roads are a major contributing factor to increased sediment loads in streams, seriously impacting water purveyors' ability to utilize the water. According to Herbert, "Florsheim et al (2000) cite numerous studies that have documented 'the link between roads, increased flow, and sediment production related to gullies, road surface erosion, and culvert failure in steep and forested areas.'"<sup>2</sup>

While poor road maintenance on residential properties is also a contributing factor to increased stream sediment loads, the solution is not more logging, but better county code enforcement.

**In** fact, county data from 1994 showed that between 1987 and 1993 an average of 39% of logged parcels changed ownership following logging, with a low of 19% and a high of 63% with an average of development permits on 38% of those parcels. While we have heard

---

<sup>1</sup> Herbert, Elizabeth, "Forest management by West Coast water utilities: Protecting the source?": Journal **AWWA**, February 2007, pg 95.

<sup>2</sup> *Ibid*, pg 95

repeatedly that if we don't allow logging we will encourage development, logging leading to development has been the reality in this county. Staff has told us that those levels have decreased somewhat in recent years. We can guess that this may be because the county's zoning ordinances limiting logging largely to TPZ parcels has reduced the number of 'exploitative' harvests from landowners in it for the money and not for long-term timber management. Due to the original criteria developed by staff and approved by the Board of Supervisors, the majority of parcels put in the TP zone district were larger than 40 acres.

Remember, the TPA was created to protect the timberlands of the state for long-term timber management, "the long term productivity of the forest resource". It was not designed to allow timberland owners to 'cut and run'. By raising the minimum parcel size, your Board will discourage landowners who are only in it for the 'buck'. The county determined in **1977** that smaller parcels were not viable economic units for long-term timber management and took this into consideration when originally required by the State to rezone all qualifying parcels to TPZ. See below, for more information.

In addition to the problem of logging as a pre-cursor to development, other unforeseen economic costs from logging are passed onto our community. Logging debris mobilized by excessive run-off has damaged county bridges, and 80,000 lb fully-loaded log trucks have added significantly more wear and tear to mountain roads than individual automobile trips.<sup>3</sup> Logging has adversely impacted drinking water quality and increased sediment loads are also a problem for our Federally-listed 'endangered' coho salmon and State-listed 'threatened' steelhead trout populations. The majority of Santa Cruz County streams are listed under the Clean Water Act section 303(d) as water quality impaired for sediment. Logging has been cited as a contributing factor.<sup>4</sup>

## Background

In 1976 the Timberland Productivity Act (TPA) was passed and required all counties to zone lands "assessed for growing and harvesting timber as the highest and best use of the land" as Timber Preserve Zone (TPZ) This has since been changed to Timber Production Zone. These parcels would be put on the 'A' list. All 'A' list parcels, except those contested, were required to be zoned to TPZ. Santa Cruz County had none.

The TPA also required counties to "assemble a list of all parcels, "which , ... appeared in the judgment of the assessor to constitute timberland, but which were not assessed for growing and harvesting timber as the highest and best use of the land." These comprised the 'B' list. All such parcels were to be rezoned to TPZ "unless the owner can demonstrate to the satisfaction of a majority of the full board that it would not be in the public interest for such parcel(s) to be zoned as TPZ."

---

<sup>3</sup> The General Accounting Office reported that an 80,000lb vehicle causes the equivalent wear and tear to state highways as approx. 9,500 automobile trips.

<sup>4</sup> i.e., the State has recently approved a Total Maximum Daily Load (TMDL) for sediment for the Pajaro River. Timber harvesting activities were identified as a source of the sediment. [http://www.swrcb.ca.gov/tmdl/303d\\_lists2006.html](http://www.swrcb.ca.gov/tmdl/303d_lists2006.html)

At the Board of Supervisor's Hearing on February 21<sup>st</sup>, 1978, Santa Cruz County Supervisors approved the 'B' list and zoned the majority of the parcels on that list as TPZ. Approximately 45 contested parcels were deleted.

Prior to the hearing, Planning Staff did an extensive analysis of parcels with timber resource, including interviews conducted with local foresters and various 'B' list property owners. Staff developed six principal factors that were used to determine which parcels ought to be included on the 'B' list. These factors were:

- **Vegetation** ("quantity, quality and distribution of existing or potential vegetation especially hardwoods and conifers. Whether or not a parcel meets MDEU (Minimum Desirable Economic Unit-(see below) criteria is a major consideration.")
- **Topography** ("physical factors which would adversely affect the growing and/or harvesting of timber." "Especially significant would be excessively steep slopes, cliffs or riparian corridors which would prohibit the establishment of roads or skid trails...")
- **Access** (characteristics "which would prohibit trucks from hauling to and from the site")
- **Surrounding Land Uses** ("adjacent parcels in small lot (urban) size ownerships, zoning is a residential district, and General Plan designates the vicinity as urban reserve").
- **Soil Type** ("soils which would preclude the parcel's ability to grow harvestable volumes of timber")
- **Environmental Factors** ("highly erodable watershed areas, unique wildlife habitats, or important scenic resources on the property")

In addition, Planning Staff made a recommendation that all parcels on the 'B' list must qualify as Minimum Desirable Economic Units (MDEUs). The criteria for MDEUs, which were adopted by the Board of Supervisors, required a 40 acre minimum parcel size for land containing mixed evergreen vegetation and a 20 acre minimum if coverage was 100 percent conifers. In addition, improved parcels needed to meet the 40 acre minimum parcel size while unimproved parcels needed to meet MDEU and 20 acres in size.

In addition to adopting an 'A' list, for which no timberland qualified in Santa Cruz, and a 'B' list of appropriately designated timberland parcels, the TPA required counties to develop criteria for a 'C' list. This was a petitioner's list. "Owners of timber-bearing parcels, who were not notified by the Assessor that they were on the 'B' list could, after November 1, 1977, request inclusion on the 'C' list.

The TPA allows for petitioner rezoning applications to TPZ as long as the parcels meet a set of limited criteria identified in the TPA. The one significant area that is at the discretion of the county is the minimum parcel size for rezoning to TPZ.<sup>5</sup> But even here, the TPA has set the upper limit for that parcel size at 80 acres. (It was originally set at 160 acres, or a quarter-section, but changed to 80 acres in 1982.)

---

<sup>5</sup> Counties can also determine compatible uses

To summarize, in 1977-78, Santa Cruz County Board of Supervisors made a determination of which parcels qualified to be on the 'B' list and then these were rezoned to TPZ based on a set of six principal factors and MDEU requirements. ALL parcels which qualified were rezoned to TPZ, *except* for approximately 45 parcels contested by the property owners.

The Supervisors also determined that the minimum parcel size in Santa Cruz County for petitioner rezoning applications would be just 5 acres, even though the Supervisors had determined the MDEU to be significantly larger and even though most other counties set the minimum size at 160 acres, the allowable size at that time. The smallest minimum parcel size fore rezoning to TPZ elsewhere appears to be 20 acres in Humboldt County, determined by site class (the quality of the land for growing timber).

### Current Conditions

Currently in Santa Cruz County more than 65,000 acres (over 100 square miles) are in the TPZ zone district. Another 7,800 acres with mapped timber are in parcels larger than 80 acres and as such will not be impacted by any actions regarding minimum parcel size increases. These can be rezoned to TPZ should the owners so desire. Thus, approximately 72,000 acres of timberland in Santa Cruz County are effectively available to apply for timber harvest permits. Additionally, rural landowners can cut trees within 150' of their homes or any other legally permitted structures under fuel hazard reduction Exemptions. These are permits which do not require a review process and are granted as long as they meet the minimal CAL FIRE (CDF) requirements.

Another 22,636 acres have mapped timber and are on parcels less than 80 acres in size and larger than 5 acres. Some of these, undoubtedly, are adjacent to TPZ parcels. No minimum parcel size applies to rezoning contiguous parcels to TPZ as long as they are in the same ownership. The definition of 'contiguous' from the TPA does not even require the parcels to actually be touching, only "adjoining or neighboring or are sufficiently near to each other, as determined by the board or council, that they are manageable as a single forest unit." Therefore, some of this land is also available for logging, should the timberland owners choose to rezone, or should adjacent timberland owners choose to purchase those parcels.<sup>6</sup>

Additionally, the approximately 23,000 acres with mapped timber (remember, these were excluded from the original 1978 TPZ 'B' list) most likely are only partly timbered. All were excluded from rezoning in 1978 because they did not meet MDEU and/or had limiting physical constraints as identified above, unless they were one of the 45 parcels excluded because they were contested by the landowners. Nearly 19,000 acres are in parcels less than 40 acres in size. These would have been reviewed in 1978 and rejected as not meeting the MDEU or having other qualities leading to exclusion from the 'B' list. It is hard to see how those same parcels would now suddenly be viewed in a whole different light. Especially considering the potential impacts to water supplies, roads, and other valuable county resources identified above.

---

<sup>6</sup> Six current rezone applications are being processed by Planning Staff. One application contains contiguous parcels of 14,941 square feet and 1.326 acres. One parcel is completely within the riparian comdor of a tributary to Valencia Creek.

Logging per various parcel sizes

We did a brief data analysis for timber harvest plans approved by CDF from 1995-2004.<sup>7</sup> The acreage figures do not necessarily agree with the APN size, but reflect the size of the timber harvest unit. In many cases the two figures are synonymous. In that ten year period approximately 22,000 acres were approved by CDF for harvest. Only 33 acres were in units 5 acres or less in size. Approximately 2,200 were for units less than 40 acres in size. Nearly 80% were on parcels over 80 acres in size.

Thus, during that time period the bulk of timber harvesting occurred on parcels greater than 80 acres and nearly all on parcels greater than 40 acres in size. Raising the minimum parcel size to 40 acres could help to reduce conflicts in urbanized mountain neighborhoods, plus protect water quality, challenged local fish populations and county roads, without producing an undue burden on the local timber industry. Raising the bar to 80 acres would allow the County to exercise its zoning authority to the greatest extent allowed by law and still allow for significant timber harvesting in the county.

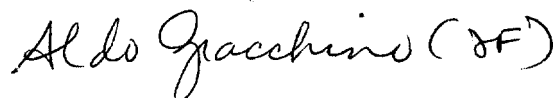
While we said in our opening comments that we urge your Board to adopt 80 acres as the minimum parcel size for rezoning to TPZ, in no circumstance do we believe the minimum parcel size should be set at less than 40 acres.

We hope you will seriously consider our comments.

Thank you for the opportunity to share our views,



Jodi Frediani  
Chair, Forestry Task Force



Aldo Giacchino  
Chair, Executive Committee

---

<sup>7</sup> These numbers come from CDF Felton files.

**WEBSTER & ASSOCIATES  
2-2590 EAST CLIFF DRIVE  
SANTA CRUZ, CA 95062  
831-462-6237**

Copy To Each Supervisor

B

**April 14, 2007**

Santa Cruz County Board of Supervisors  
701 Ocean Street  
Santa Cruz, CA 95060

RE: Hearing on TPZ acreage limitation.

Dear Supervisors:

I am a California Registered Professional Forester (#1765), an ISA Certified Arborist (WE-6314A) and the President of Webster & Associates, Consulting Foresters. I have been a practicing forester in the Santa Cruz Mountains since 1976. I have also had an office in Sonoma County and practiced forestry in Sonoma, Mendocino, Humboldt, San Mateo, Monterey and Santa Cruz counties. I have previously served on the California Licensed Foresters Association Board of Directors, the Coast District Technical Advisory Committee to the State Board of Forestry, the Best Management Practices Committee to the Board of Forestry, co-founder of the Central Coast Forestry Association and a timberland owner as well.

The Santa Cruz County forestry community has led the way statewide in improved forestry practices and has been on the cutting edge of sustainable forestry practices. It ~~is~~ recognized statewide as having the most stringent forestry practices. It was noted in a recent Forbes Magazine article and covered in the Santa Cruz Sentinel that Santa Cruz County is one of the five worst communities in the United States to do business. This is demonstrated by the local environmentalist community efforts to back measures since 1976 to make the climate increasingly difficult for the forest products industry to survive. From 1975 forward we have seen a notable decline in the number of sawmills doing business in the County. Previously we have had Holmes Lumber, Scarborough Lumber, Big Creek Lumber (local mills), as well as Harwood Products, Philo Lumber, Georgia Pacific, Sequoia Forest Products, Redwood Empire and Green Valley Sawmills buying local timber. Forest landowners are now down to only Redwood Empire and Big Creek Lumber. This is closely correlated to the increasing cost of doing business here, and is especially difficult for the smaller landowners.

The first issue I would like to address is the frequently stated belief that large parcels zoned TPZ will reduce controversy surrounding proposed timber harvests in the Santa **Cruz** Mountains. My experience and

#<sub>1</sub> 32

observation over the years is that this is clearly not the case. Some examples of smaller non TPZ THP's with minimal controversy are the following harvest: Carroll, Webster (my property, 10 acres zoned SU), Cury, Luther, several Tim Peete Projects, Maupin, Locatelli/Harwood, Hubback, Biscevic, Krupocki, and many more. An example of large TPZ parcels generating significant controversy are the following: Big Basin Water Company, Redwood Empire (Lompico and Ramsey Gulch), Big Creek/Walsh, St Francis, City of Watsonville/Rattlesnake Gulch, Holmes/Manson Creek, and many others. Clearly size of parcel and zoning has little to do with the level of protest over a harvest.

If the zoning limitation is not changed it will have minimal effect on the number of THP's proposed for rezoning and future harvest. It is self limiting because with the high cost of THP's, it is unlikely that many smaller parcels (under 20 acres) will be proposed for harvest or rezoning unless they are extremely well stocked and productive forestland. Increasing the acreage will hurt a few smaller forest landowners who happen to own such parcels.

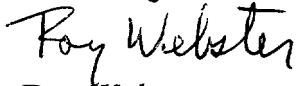
While the size and volume of smaller harvests varies, in general, 150,000 board feet is near the minimal size for an economical harvest unit. If a plan has few environmental and political constraints, it may go as low as 100,000 board feet. In order to yield a harvest of 150,000 board feet, the parcel must contain a total volume of about 300,000 board feet. In my experience there are some ten acre parcels that ~~run~~ 30,000 board feet per acre. In fact my own and David Cury's ten acre parcels at the end of Glen Haven Road have such stands of timber. We both rezoned to TPZ several years ago and have conducted **two**, light, selective harvests since 1986.

The average site class of redwood forest in the Santa Cruz Mountains is Site Class **3**. This is a measure of site productivity and is measured by a site curve of the height of dominant trees at 100 years of age (copy attached). That is site index 140, the average height of the dominant trees. The most referenced yield table in use in the Santa Cruz mountains was prepared by Lindquist and Palley in 1963 (copy attached). That table reveals that site index 140 at 100 years of age yields 114,600 board feet per acre. Dividing the volume by 100 years means the average acre **grows** 1146 board feet per acre per year. That means that a 10 acre parcel could yield 17,190 board feet per acre on a fifteen year cutting cycle or 171,190 board feet per harvest on a sustained yield basis. This exceeds my estimated minimum harvest of 150,000 board feet. Of course that means that the entire parcel must be fully stocked, and many ten acre parcels will not meet that criteria. Many will, however. Since the minimum return time by Santa **Cruz** County rules is 10 years if the harvest is less than 50% of the trees greater than 18 inches DBH and 14 years if the harvest is 51 to 60%, the 15 year cycle is reasonable.

Considering the above, I am recommending that the Board of Supervisors leave the acreage limitation for TPZ rezoning as it is, or, at the very least, increase it to no more than 10 acres. If the Board is so inclined, I am offering to take the Board on a field trip of my 10 acre parcel at its convenience, so they can view the results of such management practices.

Thank you for consideration of my views.

Sincerely,

A handwritten signature in cursive script that reads "Roy Webster".

Roy Webster, owner  
Webster & Associates

Table A-42. Yield table, young-growth coast redwood stand, all species, per acre, board feet, International 1/4" rule, trees larger than 10.5 inches dbh to an 8-inch top.

Age (years)	Site index (feet)							
	100	120	140	160	180	200	220	240
20	...	600	2,300	7,000	14,500	23,900	35,000	46,500
30	900	3,100	9,500	19,600	34,500	52,300	71,600	93,200
40	2,800	8,800	20,400	36,900	57,900	82,100	108,700	137,500
50	7,300	16,500	33,700	55,300	82,000	112,700	146,000	181,300
60	14,400	27,400	48,900	74,500	106,100	142,100	180,900	221,900
70	22,800	40,400	65,000	94,500	130,400	170,900	214,400	259,500
80	32,400	53,700	81,500	114,300	153,500	198,200	244,800	293,500
90	44,000	67,400	98,300	133,800	176,400	224,100	273,600	325,700
100	55,760	81,300	114,600	152,300	198,100	248,500	301,700	357,600

U.C., Lindquist and Palley, 1963

Table A-43. Yield table, young-growth coast redwood stand, all species, per acre, cubic feet, trees larger than 4.5 inches dbh to a 4-inch top.

Age (years)	Site index							
	100	120	140	160	180	200	220	240
20	200	450	1,000	2,270	3,990	5,910	7,860	9,940
30	500	1,050	2,500	4,400	7,040	10,000	13,000	16,200
40	1,000	2,300	4,500	7,250	10,550	14,250	18,000	22,000
50	2,100	3,600	6,800	10,100	14,060	18,500	23,000	27,800
60	3,600	5,820	9,220	12,960	17,450	22,480	27,580	33,020
70	5,200	8,000	11,750	15,880	20,820	26,350	32,000	38,000
80	6,900	10,140	14,190	18,610	23,990	29,980	36,060	42,540
90	8,800	12,260	16,580	21,310	27,050	33,450	39,940	46,860
100	10,600	14,280	18,880	23,940	30,010	36,820	43,720	51,080

U.C., Lindquist and Palley, 1963

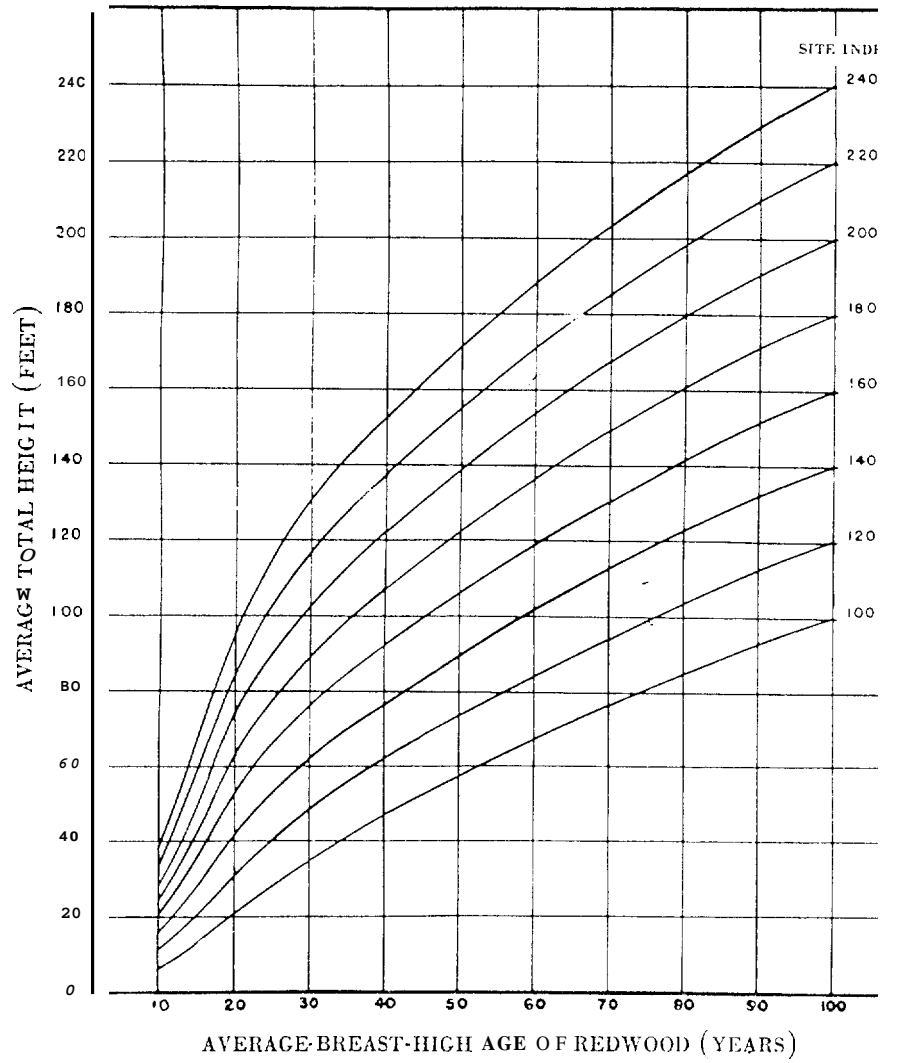


Figure A-1. Site index values of dominant redwood by height and breast-high age classes.

U.C., Lindquist and Palley, 1963

**W.J. Boothby Construction**  
P.O. Box 405  
Felton, CA 95018-0405

Lic. 649876  
831-335-5037

4/16/07

Dear Mark Stone and Board of Supervisors,

I write you to ask you not to change the timber harvest parcel zoning at this time. I believe that the county should maintain the five acre parcel size for now. If at a later time there is public consensus for more restrictive logging zoning, I could support a change. What I see happening now is that a vocal minority of activists is setting the agenda. I appreciate their concerns for the forest and the wildlife, but I don't see the need for change right now.

A main reason for my point of view is that I think Big Creek Lumber and the McCrarys have done a reasonably good job over the decades as responsible loggers. When I look at the forests and ridges of the county, I don't see excessive damage. Any logging is messy at some level, but if done with the right care, I believe that selective logging of second growth forests can be sustainable.

We are living in a forest that was drastically altered by the logging of 100-150 years ago. The old growth that was preserved is very special and should be cherished and appreciated more than ever. However, we also have areas where the second growth that grew back exists in unnaturally dense stands of small trees. I support selectively logging them and I think we can do it in a sustainable way.

Santa Cruz County has great forest resources, not just in redwoods. I think we can continue to use them. To lock up significant sections with restrictive zoning is not the best way to proceed in my opinion. One reason is that we are lumber consumers. Most of us live in wood frame houses and build wooden decks and fences. If we can satisfy some of our appetite for wood products with local materials, I think we should. I have not had time to research the issues of zoning designations, state vs. county control, and the legal history, **so** I can't fairly comment on them at this point.

This issue comes on the heels of the Fish and Game Commission's vote to set up marine reserves. Sometimes I feel that the average person is not heard unless they have the time and dedication to attend hearings and meetings. I hope that we can find a way to use our local resources sustainably. If we just lock up our own while at the same time we import wood and fish from other regions without changing our consumption, where does that leave us at the end of the day? Perhaps "Buy Fresh, Buy Local" can work for lumber too.

Sincerely,  
Johnson Boothby

# 32

**CBD BOSMAIL**

---

**From:** CBD BOSMAIL  
**Sent:** Sunday, April 22, 2007 6:02 PM  
**To:** CBD BOSMAIL  
**Subject:** Agenda Comments

---

**Meeting Date :** 4/24/2007

**Item Number :** 32

**Name :** Charles Paulden

**Email :** Not Supplied

**Address :** Not Supplied

**Phone :** Not Supplied

**Comments :**

I support the comments by the Sierra Club and the Lompico Watershed Conservancy in their recommendation of zoning TPZ at 80 acres. As can be seen from staff, many County's have larger requirements. The conflict between neighbors on smaller parcels lead to the rezoning battle that Santa Cruz won. We owe it to our County to protect the forest lands. They provide habitat, watersheds, recreational and tourist benefits. Please take the time to consider the reasons that those who do not have a vested interest in cutting our forest have made. Though we are not clear cutting the Amazon Rain forest, anything we can do to keep carbon in the trees will help to benefit our County. As so much of our community is in low lying coastal areas and as much of our income comes from beach visitors, we need to consider the impact of global warming due to burning of fossil fuels. The owners of our forested lands may find financial benefit by selling carbon credit to those who are attempting to offset their carbon footprint.  
Happy Earth Day 2007  
Charles Paulden

**CBD BOSMAIL**

---

**From:** CBD BOSMAIL  
**Sent:** Monday, April 23, 2007 6:33 AM  
**To:** CBD BOSMAIL  
**Subject:** Agenda Comments

---

**Meeting Date :** 4/24/2007

**Item Number :** 32

**Name :** Ron DeBenedetti

**Email :** RonandLois@alo.com

**Address :** 731 Rider Road  
Watsonville Ca.

**Phone :** 831 6886230

**Comments :**

We the land owners of timber property are worry about changing the Timber Production Zone from 5 acres. Owners of small Properties with a zoning such as Special Use, Now have to rezone to TPZ. The majority of smaller forested parcels are owned by individual families. They will be greatly impacted by this. We have maintained the property for our future retirement. We have planned this for our family to run, in the future. The rezoning will hurt a lot of families that have already invested in there propertes over the years to maintain roads, culverts and general maintance. The logging practices of Santa Cruz County by the timer companies are very good.

**CBD BOSMAIL**

---

From: CBD BOSMAIL  
 Sent: Sunday, April 22, 2007 2:31 PM  
 To: CBD BOSMAIL  
 Subject: Agenda Comments

---

**Meeting Date** : 4/24/2007**Item Number** : 32**Name** : Robert E. Ekstrand**Email** : rsimage@earthlink.net

**Address** : Mailing Address:  
 5567 Copeland Place  
 San Jose, CA 95124  
 Santa Cruz Co Landowner  
 APN 087-053-03 (3A)  
 APN 087-261-09 (10A)

**Phone** : 408 356 7647**Comments :**

Item 32 Agenda for April 24, 2007

Minimum parcel size for rezoning into the Timber Production Zone District (TPZ)

Board of Supervisors - Santa Cruz County

As a Santa Cruz County landowner since 1975, I firmly support maintaining the current 5 acre minimum acreage requirement for TP Zoning.

When I purchased my first Santa Cruz County property in 1975 the parcel was zoned as TPZ, which allowed me to build a single family residence on the property. Owner built construction occurred between 1979 and 1982. In 1981 I had the opportunity to purchase the adjacent 3 acre parcel which was also zoned TP. In 1983, following heavy storms, a 2.5 acre slide occurred on the seven acre parcel which resulted in closure of our community road and substantial timber loss. Since both parcels were in TP zoning I was able to obtain a THP in a reasonable time frame to accomplish a salvage harvest from the slide area and a selective harvest of the remaining area of the two parcels.

Subsequently, without my knowledge or notice given, the county changed the zoning of my parcels and others in the area to "SU".

In the intervening years, I have sold the 7 acre parcel with the single family residence and have acquired an adjoining ten acre parcel.

As a trained forester with a high interest in forestland stewardship, I strongly object to the proposed change in minimum acreage for consideration for rezoning **SU** to TP. Elimination of selective harvesting in the silvicultural stewardship of small acreages will contribute to the decline of healthy forestlands within Santa Cruz County.

Sincerely,

4/23/2007

32

Robert E. Ekstrand

**WILLIAM H. SMALLMAN  
11765 EDGEWOOD RD  
FELTON, CA 95018**

April 22, 2007

**Board of Supervisors.  
County of Santa Cruz**  
701 Ocean Street, 4<sup>th</sup> Floor  
Santa Cruz, CA  
Fax (831)-454-3262

**Facsimile Transmittal: 2 pages**

Dear Supervisors,

**RE: TPZ- Increase of Minimum Parcel Size**

In order for Santa Cruz County to be a leader in up to date Environmental Protection policies, which exhibit the best choices based on the sound scientific knowledge; very important decisions need to be made to achieve this. After reviewing all the arguments for and against this issue, it is clear to me to choose the larger value of land, which I believe to be 80 acres vs. 20 acres, as state would then require for timber harvest plans. I would further argue that the County should gain even more power to reduce logging, and correct some very bad past zoning decisions. Without going in to too much detail, this is a partial list of my reasoning:

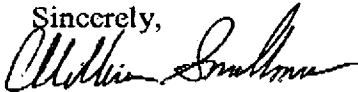
- ✓ Even on the new argument about Global Warming, one should choose to protect more trees. An untouched Redwood forest consumes an enormous amount of carbon dioxide from the atmosphere vs. one, which is logged.
- ✓ The argument that logging saves the land from the trees getting disease and reduces fire danger is absolute hogwash. The work to remove evasive plants and excessive dead brush; can obviously be done without logging; and there are numerous volunteers for this work. Moreover, there is little if any cost to maintain untouched land. The cost to maintain roads for logging access is what costs money.
- ✓ The people, who own these semi-large parcels, are land rich. The amount of money which would be made from logging is substantial, however not necessary for their economic survival. Some of the larger parcels, I would think that these people could sell portions of the land for top dollar to an open space district which would preserve the land which their homes could border. Moreover, the smaller parcels 20 to 40 acres would sure to cause numerous neighborhood disputes.

#32

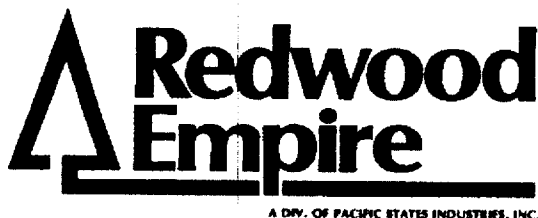
Page 2

- ✓ Water districts spend hundreds of thousands of dollars treating drinking water from which most of these lands collect. Bottom line is that the more pristine the watershed canyons are, the less money and better quality of health our drinking water will become.
- ✓ The aesthetic quality of Santa Cruz County would diminish greatly. Nisense Marks State Park was heavily logged and probably still not yet to the grandeur of it's pristine past. Think of the county surrounded by forests reaching old growth status in terms of size.
- ✓ End the sprawl now. People are against widening Highway one to stop development of more housing, and then they sit in traffic, which takes an hour to get from the fishhook to 41<sup>st</sup>. Does this make any sense? Why not begin protecting land, curbing bad development decisions. It's clear to me this decision is an important step towards this goal.
- ✓ Redwood lumber is fast becoming an obsolete building material for reasons above. Recycled plastic lumber and other alternative building materials are the wave of the future. Policy decisions need to take into account up to date technologies to promote a sound economic future, not to idle in the sentimental doldrums of lumber companies and land owners trying to make their last buck at the expense of our county.

Sincerely,



William Smallman



SANTA CRUZ FORESTRY  
 1395 41<sup>ST</sup> AVENUE, SUITE D, CAPITOLA, CA 95010  
 (831) 464-8788 • FAX (831) 464-8780

23 April 2007

Board of Supervisors  
 County Building  
 701 Ocean Street  
 Santa Cruz, CA 95060

RE: Item #32-Proposed change to minimum parcel size for TPZ.

Dear Members of the Board:

Redwood Empire Sawmills is a Family owned business that has been managing land for both large and small landowners for almost twenty years. We also purchase timber on the open market from private landowners, and provide lumber to many local retail lumber businesses. We support and contribute to this beneficial rural economy.

We are opposed to the further reduction of available timberland in Santa Cruz County, especially when that reduction will almost certainly increase the density of rural housing, increase pressures on infrastructure, compound existing traffic problems, and have a net reduction in open space and wildlife habitat. The current five acre minimum allows small landowners the option to realize some revenue from their property without resorting to more detrimental land uses such as development. This does not mean that every landowner will choose that avenue, but it should be maintained as an option.

The Staff Report has not identified any compelling necessity for changing the current minimum parcel size to be eligible for TP zoning, but has alluded to some rationale for the increase proposed in the Staff Report. One rationale is that of being consistent with other timber producing counties. While some of the counties queried have chosen larger minimum parcel sizes than are being proposed by staff, it is extremely important to note that those counties do not have restrictions on timber harvesting outside the TP zone. It is vital to understand that non-TP zoned parcels in those counties may harvest timber, where in Santa Cruz County, they will not have that ability. Disallowing the option to rezone into TP will remove the option to manage timber from those landowners.

Conflict reduction is another rationale contained in the Staff Report. In the last ten to fifteen years, the most contentious harvest plans in the county have been on lands zoned TP. These were larger parcels that would have been eligible for rezoning to TP, even had they not been zoned as such. We do not agree that conflict issues are greater on smaller parcels, and an examination of county appeal actions to the Board of Forestry regarding timber harvesting prior to 1999 would illuminate this point.

Finally, the perspective of economic viability should be that of the landowner and not the county. Staff has suggested that average parcels of less than twenty acres is not likely viable for

Board of Supervisors  
RE: TPZ Minimum Acreage  
Date 4/23/07  
Page 2

timber production in the long term. While this may be logical, there has been no compelling evidence offered that outweighs the stripping of a landowners ability to manage their timber if they so desire. If the expenses of rezoning to TP and subsequent timber management are acceptable costs, then the county should continue to offer that opportunity to those willing to submit to use restrictions, and intense regulatory scrutiny on their land.

The County General Plan clearly supports the continued production of timber, as an agricultural activity, which will be categorically excluded on almost thirteen thousand acres throughout the county under the current proposed elevation to a twenty acre minimum.

We respectfully request that the current minimum parcel size for rezone to TP be maintained.

Sincerely,



David Van Lennep  
RPF #2591

**CBD BOSMAIL**

---

**From:** CBD BOSMAIL  
**Sent:** Monday, April 23, 2007 2:14 PM  
**To:** CBD BOSMAIL  
**Subject:** Agenda Comments

---

**Meeting Date :** 4/24/2007

**Item Number :** 32

**Name :** Cate Moore

**Email :** cateymoore@mac.com

**Address :** CCFA  
P. O. Box 1670  
Capitola, CA 95010

**Phone :** 831-335-4764

**Comments :**

April 23, 2007

Santa Cruz County Board of Supervisors  
701 Ocean Street, 5th floor  
Santa Cruz, CA 95060

RE: Item 32 on agenda of April 24, 2007

Dear Supervisors,

Before proposed changes to acreage requirements to rezoning to TP are finalized, the County of Santa Cruz needs to contact all potentially affected landowners. They must have a chance to consider their changed management options and decide what actions they need to take to protect those land properties they find most valuable. Additionally:

. Any proposed change to the current acreage requirements to rezone timberland to the Timber Production Zone (TPZ) requires a full Environmental Impact Report. People who are no longer able to manage their land for timber will find other uses for that property and the impacts of those changes need to be assessed.

. The cumulative impacts of the ever-increasing number of timber regulations should be carefully considered. There are more than 1000 State Board of Forestry regulations governing timber harvesting locally, as well as a growing number of extremely onerous regulations from several state and federal agencies.

. Owners of smaller properties with a zoning such as "Special Use", which have long carried a higher tax rate in order to be allowed additional uses of their private property, should be fully compensated for any loss of property value as well as refunded the amount of the higher tax rate if their right to rezone to TP is eliminated.

4/23/2007

32

. The majority of smaller forested parcels in this county are owned by individual families. These families will be greatly impacted by any increase in the acreage size required in order to rezone to TP. For many families, their trees are their savings account.

. It is through a selective timber harvest that roads and culverts are upgraded, and necessary fuel reductions occur. Curtailing landowners' ability to harvest timber in smaller plots will thus degrade the safety of both them and their neighborhood.

. Once zoned as TP, it is extremely difficult to change the zoning for a different use, contrary to popular urban myths.

. TPZ lands are the most regulated and scrutinized within the county's forest lands. The timber harvesting process is subject to extraordinary review that other land uses don't receive. This results in higher land use standards.

. The timber yield tax goes directly to the County coffers.

The County should allow for rezoning of any parcel which has applied for TPZ during this period since the lawsuit began. Some landowners who applied or inquired about rezoning, were told that they would have to tear down structures in order to rezone. This is known as placing a condition on the rezone, which is no longer allowed, according to the CA Supreme Court ruling. These people should all have the opportunity to have their applications reviewed again, and processed before the acreage size requirement is increased.

Opponents to timber harvesting point out that 5 acres is the smallest acreage requirement in the State for rezoning to TP. What they don't mention is that other counties allow timber harvesting on lands not zoned TP. The volumes of pages submitted to you by the Lompico Watershed Conservancy are completely meaningless, due to this fact, plus the fact that clearcutting is still practiced in many of the northern counties, while it has neither occurred nor been allowed in this area for over 50 years.

Once again, all landowners who are potentially affected by any proposed change in policy should be notified by the County of Santa Cruz of all public hearings on this issue.

Sincerely,

Cate Moore  
President  
Central Coast Forest Association



# Central Coast Forest Association

*Caring for the forests, protecting our land*

PO Box 1670, Capitola, CA 95010

## Directors

Robert Briggs  
 Charles Burton  
 Richard Burton  
 Pat Driscoll  
 Jim Hildreth  
 Barbara McCrary  
 Cate Moore  
 Eric Moore  
 Lisa Rudnick

April 23, 2007

Santa Cruz County Board of Supervisors  
 701 Ocean Street, 5<sup>th</sup> floor  
 Santa Cruz, CA 95060

RE: Item 32 on agenda of April 24, 2007      DRAFT

Dear Supervisors,

Before proposed changes to acreage requirements to rezoning to TP are finalized, the County of Santa Cruz needs to contact all potentially affected landowners. They must have a chance to consider their changed management options and decide what actions they need to take to protect those land properties they find most valuable. Additionally:

- Any proposed change to the current acreage requirements to rezone timberland to the Timber Production Zone (TPZ) requires a full Environmental Impact Report. People who are no longer able to manage their land for timber will find other uses for that property and the impacts of those changes need to be assessed.
- The cumulative impacts of the ever-increasing number of timber regulations should be carefully considered. There are more than 1000 State Board of Forestry regulations governing timber harvesting locally, as well as a growing number of extremely onerous regulations from several state and federal agencies.
- Owners of smaller properties with a zoning such as "Special Use", which have long carried a higher tax rate in order to be allowed additional uses of their private property, should be fully compensated for any loss of property value as well as refunded the amount of the higher tax rate if their right to rezone to TP is eliminated.
- The majority of smaller forested parcels in this county are owned by individual families. These families will be greatly impacted by any increase in the acreage size required in order to rezone to TP. For many families, their trees are their savings account.
- It is through a selective timber harvest that roads and culverts are upgraded, and

#32

necessary fuel reductions occur. Curtailing landowners' ability to harvest timber in smaller plots will thus degrade the safety of both them and their neighborhood.

- Once zoned as TP, it is extremely difficult to change the zoning for a different use, contrary to popular urban myths.
- TPZ lands are the most regulated and scrutinized within the county's forest lands. The timber harvesting process is subject to extraordinary review that other land uses don't receive. This results in higher land use standards.
- The timber yield tax goes directly to the County coffers.

The County should allow for rezoning of any parcel which has applied for TPZ during this period since the lawsuit began. Some landowners who applied or inquired about rezoning, were told that they would have to tear down structures in order to rezone. This is known as placing a condition on the rezone, which is no longer allowed, according to the CA Supreme Court ruling. These people should all have the opportunity to have their applications reviewed again, and processed before the acreage size requirement is increased.

Opponents to timber harvesting point out that 5 acres is the smallest acreage requirement in the State for rezoning to TP. What they don't mention is that other counties allow timber harvesting on lands not zoned TP. The volumes of pages submitted to you by the Lompico Watershed Conservancy are completely meaningless, due to this fact, plus the fact that clearcutting is still practiced in many of the northern counties, while it has neither occurred nor been allowed in this area for over 50 years.

Once again, all landowners who are potentially affected by any proposed change in policy should be notified by the County of Santa Cruz of all public hearings on this issue.

Sincerely,



Gate Moore  
President  
Central Coast Forest Association

**CBD BOSMAIL**

---

**From:** CBD BOSMAIL  
**Sent:** Monday, April 23, 2007 1:05 PM  
**To:** CBD BOSMAIL  
**Subject:** Agenda Comments

---

**Meeting Date :** 4/24/2007

**Item Number :** 32

**Name :** Nancy Drinkard

**Email :** nancy@santacruzers.com

**Address :** Not Supplied

**Phone :** Not Supplied

**Comments :**  
April 23, 2007

AGENDA DATE: April 24, 2007

Board of Supervisors  
County of Santa Cruz  
701 Ocean Street  
Santa Cruz, CA 95060

Subject: Minimum Parcel Size to Qualify for Rezoning into TPZ

Members of the Board:

I have read the staff report regarding the proposal to change the minimum parcel size for rezoning into TPZ. Although the "problem" that the county is trying to fix is never stated in this report, it is clearly articulated in letters from the public and activists who believe harvesting is inappropriate and harmful most anywhere in Santa Cruz County.

My career with the California Department of Forestry and Fire Protection (CDF) included over 20 years (1982-2003) working in the Santa Cruz mountains, overseeing the state's "Forest Practice" program which regulates the conduct of timber operations on private land. The majority of timber harvests in this region occurred in Santa Cruz County. During this time I reviewed hundreds of proposed harvest plans, conducted or attended hundreds of public hearings (both those held by CDF during the review of individual plans, and those held by the county or other governmental entity), and made thousands of field inspections on active and completed timber operations. Needless to say, I experienced a full array of protests from neighbors and activists. The protests came from neighbors adjacent or in close proximity to the proposed harvest and from activists who have opposed all harvesting. I will limit my discussion to the "neighbors" group as I believe that is the audience you should most carefully listen to.

As you consider whether to increase the minimum acreage allowed for re-zoning into TPZ, I offer the following "observations" based on my experience:

1. The parcel size associated with a harvest has no relationship to the amount of opposition it may incur.
2. The location of the parcel matters: the proximity and number of neighbors have a direct relationship with the amount of opposition, at least initially. This is true whether the plan is for 10 acres or 160 acres. Landowners with numerous neighbors (and the registered professional forester who prepares the plan) may successfully address neighbors' concerns prior to submitting their plan or during the review of the plan. Many successful harvests occurred adjacent to neighbors and neighborhoods. Many included creative mitigations, trust-building procedures, and the willingness of both the applicant and his/her neighbors to compromise.
3. Harvesting is a scary proposition to most people. They understandably fear a project that they believe could harm them or their property. During the implementation of the great majority of controversial harvest plans, there were occasional complaints to CDF by neighbors dealing with issues such as trespass, hours of operation, noise, road conditions, traffic, etc. But mostly, there was silence. And, after the operation had been completed, I even heard from some neighbors who said that while they didn't "like it," their fears had not been realized. Unfortunately, this continuous political opposition "before the timber operation" does not make it easy for you.
4. Even with the current 5 acre minimum, the amount of land that will likely be rezoned to TPZ in any given year is small. Applications for rezoning will be prompted by financial considerations, new ownership, and new technology that makes harvesting on smaller parcels more economically viable. New owners of a TPZ parcel may wish to acquire adjacent non-TPZ parcels with the hope of adding this acreage to their TPZ parcel. It seems highly unlikely that someone with a 5 acre parcel surrounded by residences would consider rezoning to TPZ in today's world. But maybe "tomorrow's world" will be different.

Last of all, it is my understanding that when the county argued for the right to use its zoning authority to limit where harvesting could occur, it added the assurance that those excluded by the new restrictions (owners of non-TPZ timberland)"could always rezone to TPZ." Having legally prevailed, why would the county now limit the option it offered to non-TPZ landowners?

Respectfully submitted,

Nancy Drinkard  
RPF # 1979

April 21, 2007

Board of Supervisors  
Santa Cruz County  
701 Ocean Street  
Santa Cruz, CA 95060

Dear Members of the Board,

We, the undersigned, submit this letter to put to rest the ongoing intentional misrepresentation of the actions of the 1997-1998 Timber Technical Advisory Committee (TTAC). The TTAC included members of the public, forest landowners, representatives of the forestry community and local anti-logging activists. The Santa Cruz County Board of Supervisors convened the TTAC to serve in an advisory capacity to the Planning Department and the Board of Supervisors. The TTAC had no regulatory authority.

Chief Forester, Michael Jani, represented Big Creek Lumber Company on the TTAC. Big Creek Lumber's alternate to the TTAC was Forestry Department staff member, Bob Berlage. One, or both of us were present for all TTAC meetings.

During the course of TTAC meetings, a number of suggestions regarding forestry policy in Santa Cruz County were presented. Big Creek Lumber Company, and individuals from the local forestry community agreed, in concept, to some suggestions and vehemently opposed other suggestions. At the conclusion of the TTAC meetings, Planning Department staff submitted a report which erroneously stated that there was a consensus among members. There was no consensus.

The Board of Supervisors then submitted a list of proposed special county rules to the California Board of Forestry and Fire Protection. The Board of Forestry adopted half of the proposed rules, making timber harvesting in Santa Cruz County the most restrictive in California. The Board of Forestry unanimously rejected the other proposed rules, stating that they were contrary to statute and not in the Public's interest. During the TTAC, Big Creek openly opposed every suggestion that was similar to the rules rejected by the Board of Forestry. Subsequent to the initial rejection of half of the proposed rules, Santa Cruz County resubmitted the same rules, hoping that a change in Board of Forestry members would change the outcome. The Board of Forestry again unanimously rejected the rules, for the same reasons.

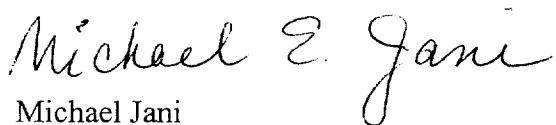
After the Board of Forestry rejected the resubmitted rules, the Board of Supervisors passed a set of ordinances similar to those suggested by the TTAC anti-logging activists. Big Creek Lumber consistently objected to these suggestions during the TTAC and filed a lawsuit against the ordinances in January of 2000.

# 3a

Julie Hendricks and Lawrence Prather submitted a letter to the Board of Supervisors, dated April 18, 2007, which falsely states, in part, " both sides agreed on the (TTAC) terms" and that Big Creek Lumber Company initially agreed with a TTAC proposal.

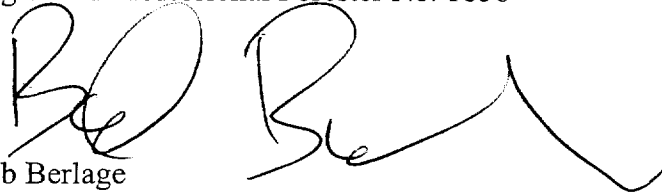
To be clear, there were no TTAC "terms" and Big Creek Lumber Company never agreed to any consensus proposal coming out of the TTAC discussions.

Sincerely,



Michael Jani

Registered Professional Forester No. 1856



Bob Berlage

Communications Director

Big Creek Lumber Company

Santa Cruz County Board of Supervisors  
701 Ocean Street, 5<sup>th</sup> floor  
Santa Cruz, CA 95060

April 24, 2007

RE: Item 32, TPZ acreage requirements

Dear Supervisors,

After reviewing letters and documents submitted for this item, I feel it is important for your Board to realize the following. On one side of the issue we have landowners who own and care for their private property, along with licensed professional foresters asking you to consider facts. Then we have the crisis industry consisting of folks who carry no licenses pertaining to this issue, and therefore feel free to tell all sorts of lies. Out and out lies.

The crisis industry would have you believe the following **mistruths**:

That local selective harvesting creates landslides, that selective harvesting contributes sediment to our streams, that CDF does not inspect and ensure compliance with the more than 1000 regulations governing a legal harvest, that timbering leads to future development, and that selective thinning adds to global warming. (Yikes)

**These things simply are not true.**

Please consider that the groups who wrote in to urge your board to increase the minimum parcel size have a serious conflict of interest. Except for the Sierra Club, the other groups who are lobbying for an increase in acreage requirements are 501(c) 3 non-profit organizations. Not only are these non-profit groups circumventing rules governing their non-profit status through their extensive lobbying, they are also promulgating propaganda – out and out lies. This is not legal.

Most of the controversy surrounding local selective harvests have been due to the intense agitation created by many of these groups in order to encourage new membership.

Additionally, most of these non-profit groups are actively targeting private land for public acquisition. **This is a serious conflict of interest.** Please consider this as you weigh the information before you today.

Sincerely,

Lisa Rudnick  
Ben Lomond

32



## C. Patrick Dugan

765 Felton-Empire Rd  
Felton, California 95018

Phone: 831-335-7332  
FAX: 831-335-5280

Santa Cruz County Board of Supervisors  
5<sup>th</sup> Floor  
701 Ocean St.  
Santa Cruz, California 95060

April 23, 2007

RE: Agenda April 24, 2007, Item #32 Consider proposed change to minimum parcel size for rezoning into the Timber Production Zone District (TPZ)

Members of the Board of Supervisors,

Forestry is not a lucrative business. It never was and never will be, because it takes longer than a lifetime to grow high-quality timber, longer than anyone can wait for a return on investment. It takes 75 to 150 years to grow timber in sizes useful for lumber and plywood; it takes twice that long to grow high-quality wood for fine furniture and musical instruments. This information was reported by the Institute for Sustainable Forestry (ISF), June 2004, Funded by: USDA Forest Service, Economic Recovery Program and Sustainable Northwest Healthy Forests Healthy Communities.

What those who subscribe to the theory of sustainable Forest Management agree on is that the ownership of timberland is not a lucrative business. The return on investment historically is 2.5% to 3.5% per year. So why do people invest in timberland? The response I hear the most is pride in ownership of private property. The benefit of owning timberland is watching the trees mature year after year, the ability to walk through our private forests, the enjoyment of maintaining the native plant life and eliminating invasive species.

My property had a selective timber harvest in 2000. The process we went through from filing an application to receiving approvals took almost a year while the actual harvest amounted to less than a month. Once the harvest ended, the trees that were covered or canopied by the mature trees began to grow at an increased rate. Mature trees that were drinking up to 1200 gallons of water per day are have given way to the younger trees in the area. The water that was being drawn up in the mature tree is also contributing to the streamflow while the younger trees are growing. More than 6 years later there is no indication that we had a harvest except that the majority of the 1500 new redwoods we planted have grown to a respectable height and the saplings that sprouted from the cut redwoods are up to approximately 6 to 10 feet in height.

I have reviewed the numerous letters included in today's agenda, Item #32 of the Board of Supervisors meeting, regarding the change in minimum parcel size to qualify for TP Zoning. These obstructionists have misled this Board of Supervisors in all of their writings, in my opinion. Who are those that I believe are the vocal obstructionists?

Patrick Dugan Page 2 4/24/2007

- Vikki Pachera, who obviously has no knowledge of physics to suggest that the selective harvesting of trees will somehow destabilize the land. Children, pets and property will be put in harms way? Where is evidence of that happening.
- Nancy Macy (Valley Women's Club, chair of the obstructionist committee) who cleared her property to build a house.
- Julie Hendriks and husband, Larry Prather, who built a house in the forest and then cried foul when a neighboring timberland owner requested a timber harvest permit, who also claim to represent Citizens for Responsible Forest Management – a misnomer. They are absolutely timber management antagonists.
- Jodi Frediani (Sierra Club, Chair of the Forestry Task Force) who wrote six pages of innuendo and pages of unsubstantiated accusations. To me, her most outlandish statement is that slash is left to accumulate to a three foot height. Her statement is totally false, as is most of her rantings. It is restricted by regulation to no more than eighteen inches. It was much less than that on my timber harvest.
- Kevin Collins (Lompico Watershed Conservancy) who submitted 52 pages of slash-and-burn attacks, then has the nerve to demand that "We should be letting current non-TP zoned forest land simply stand quietly and continue to supply us with pristine water and the wildlife so many of us claim to care about."
- Earth First Santa Cruz – No Compromise in Defense of Mother Earth. That statement is self explanatory. They should be the first to voluntarily eliminate themselves from Mother Earth and request others who espouse to their dementia to follow their lead.
- Dennis and Sandy Davie - Earth First writers who think they have a better understanding of economic and environmental values than the private property owners who have a valuable resource on it and would like to realize a return on investment someday.
- Mark Morgenthaler (Citizens for Responsible Forest Management) who is an anti-timber activist for the Sierra Club
- Betsy Herbert, who submitted 16 pages of socialist study fermenting government control of our natural resources.
- Summit Watershed Protection League, which seems to be an offshoot of the VWC.

What I have found from my investigations is that this county is less than a blip on the radar screen of California's timber industry.

In Santa Cruz County in 1996, 25,394,000 board feet of timber with a net value of \$11,508,367 was produced. All of the timber was produced by private entities (California Department of Forestry and Fire Protection 2003). In 2001, timber production in Santa Cruz County decreased by 71.5 percent from 1996 levels with only 7,230,000 board feet produced (Regents of the University of California 2001).

According to state records, in the year 2002, California timberland covered approximately 16,649,000 acres. Santa Cruz County's percentage amounted to .009% of that amount – or 156,000 acres which is virtually zero. In researching timberland in California and Santa Cruz I find quite a discrepancy between the Planning Department letter showing 64,000 acres zoned TPZ and the California Statistical Abstract 2002 that shows 70,000 acres zoned TPZ and no mention in the Planning Department letter

Patrick Dugan Page 3 4/24/2007

showing 156,000 acres of privately owned timberland in the county. What else has the county planning staff left out of their letter?

I don't believe any of these obstructionists has experienced an individual timber harvest experience from the start to 5 to 10 years hence. They will present you with a snapshot of the moment, which of course, won't be pleasant. Yes, there is a period of time after a harvest when the property looks less than pristine; however, new growth begins immediately.

What does this have to do with timberland owners of 5, 10, 20 or 50 acre parcels? Always, the issue is the right to private property. The use of private property and liberty are inseparable

It costs money to properly maintain timberland property. Those who follow timberland maintenance programs and try to protect their property from damage resulting from trespassers, fire, or some other type of destruction by outside forces have to spend money yearly. If their return on investment in timberland is only 2.5 to 3.5 percent per year they must have some incentive to continue to maintain their property. The zoning or size of the property should not be a restriction on the timberland owner's ability to realize a return on investment and our representatives have a duty to support the rights of timberland owners as a constitutional right.

When a property owner finds that the price of the timber that they have been maintaining and nurturing is adequate to give them a payback on their investment, they should be able to thin or harvest the timber based on recognized timber harvest regulations – no matter the zoning or size of their property. It makes economic sense and it also makes legislative sense to provide that incentive to the timberland owner. Taxes are paid on the harvest which means that the local schools receive income as does the county and the state. The harvest may take only a few days to a few weeks. The potential discomfort to anybody who lives around the property is minimally impacted while the property can be continually maintained in the highest standards the landowner can afford.

The obstructionists, in writing their letters and posting their propaganda, cite each others' writing as documents supporting their arguments. That is preposterous. Those who read this propaganda and subscribe to these socialist rantings may use this propaganda in support for their decision to destroy people's property rights. I consider that action a regulatory taking. Those who see through this transparent conspiracy will disregard all of their trappings and falsehoods and reject the call for this reduction in harvestable timberland.

I, therefore, request that this board reject any suggestion for a change in policy at this time. Further, I request that this board address the fact that many timberland owners with lands designated in other zones be encouraged to practice forest management procedures and I request that this Board of Supervisors give them the opportunity to selectively harvest their mature trees, if they so choose, to provide the younger trees a chance to mature and benefit the timberland owners of the future. Maintaining private timberland provides a benefit for everyone living in the forests, even the obstructionists.

Regards,

  
Patrick Dugan



# Earth Links

a nonprofit organization bringing people and resources together

April 20, 2007

Supervisor Jan Beautz  
FAX: 454-3262

Dear Jan,

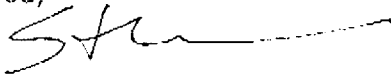
Earth Links Inc. respectfully requests that you support the highest minimum acreage allowable under State law for permitting property owners to rezone to Timber Production Zoning. Since the current 5 acre minimum was established there have been changes in logging regulations as well as the local and global environment. Current conditions call out for the need for an 80 acre minimum.

The County's control over the important land use issue of timber harvests has been severely limited by a State controlled system which does little to protect the watersheds and its residents from the negative impacts from timber harvests. The 80 acre minimum is a vital step toward protecting our local environment with its steep hillsides, easily silted waterways, threatened and endangered species, and our irreplaceable surface water supply.

Additionally with the effects of global warming, and the now very specific county level projections for increasingly limited and shorter duration rainfall, we can ill afford to give up any of our storage and recharge capacity. With climate changes already occurring, the time to act is while our local ecosystem is relatively intact. There is no time to reverse an error in zoning that might accelerate local logging and the further degradation of our water supply.

This critical decision before you will have far reaching effects. In ten, twenty, or thirty years the 80 acre standard will appear a wise, prudent, and life preserving choice. I hope it will be made quickly and confidently by all the supervisors.

Thank You,



Stephen Leinau  
Executive Director

Earth Links, Inc.  
519 Seabright Avenue  
Suite 216  
Santa Cruz, CA 95062  
831.457.0414  
Fax 831.457.0415  
elinks@cruzio.com

# 32

**CBD BOSMAIL**

---

**From:** CBD BOSMAIL  
**Sent:** Monday, April 23, 2007 10:29 PM  
**To:** CBD BOSMAIL  
**Subject:** Agenda Comments

---

**Meeting Date :** 4/24/2007

**Item Number :** 32

**Name :** Rose Marie McNair

**Email :** realrose@norcalbroker.com

**Address :** Not Supplied

**Phone :** 831 476 2102

**Comments :**  
4/24/07 Agenda

Honorable Supervisors:

Santa Cruz county is a unique county. Property owners affected by a downzoning, or a requirement that diminishes the rights now afforded to them, **MUST BE NOTIFIED INDIVIDUALLY**. Arbitrarily altering zoning because areas are "urbanizing" is NOT equitable to long term landowners whose forest products are a renewable resource, and are good stewards of their land.

Please take time to consider the ramifications of the changes made now, and come up with a better solution. Please do not raise the acreage requirement.

Thank you for your consideration.  
Rose Marie McNair, Broker  
(831) 476-2102

4-24-07

Board of Supervisors  
Santa Cruz County  
701 Ocean Street  
Santa Cruz, CA 95062

Subject: Timber Production Zone Rezoning Criteria

I read with interest Kevin Collins' letter from the record concerning TP rezoning criteria. I wish to address the following statement therein:

This should be enough land for local logging companies if they were not over-cutting their lands and those of private TP landowners. The average size of saw logs from this County has fallen in recent years as the volume of the standing log inventory on commercial TP lands has fallen. This is the result of a rate of cut which is higher than the rate of growth.

Mr. Collins didn't say where he gets his data. From what I can tell, he made it up because every reliable source I have seen refutes his claims. Forest inventory data for the County of Santa Cruz have been collected over the period from 1984-94 by the U.S. Forest Service (USFS). Inventory data were reported in 1987 and again in 1997 (the Planning Department has a copy). The 1997 document reported timber harvest rates for the last 50 years. The data are plotted on the chart below.

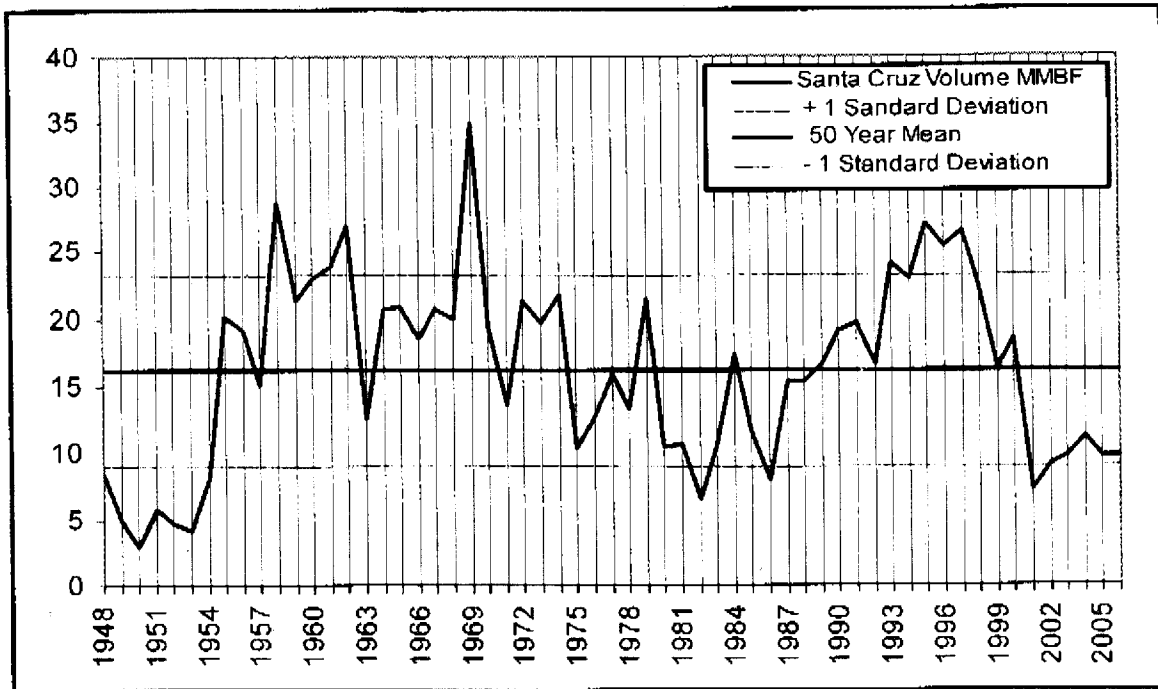


Chart 1 – Santa Cruz County Stumpage Removals 1948–2006, USFS and BOE data.

One of the first obvious things on the graph is that the harvest volume fell precipitously with the institution of TP zoning in 1979. The reason is simple: before TP zoning, people were being taxed 6% annually on the value of their standing trees. They were being forced economically to log their forests or lose their land. The message is clear: we ignore the forces of economics at our peril.

#32

You will note that the harvest has fallen precipitously in recent years. The question arises as to whether this is because of a shortage of trees or some other cause. Let's consider the inventory balance over the study period. The USFS document reports an estimate of total softwood volume for the County (on page 5) of 812 MMCF (million cubic feet) or 9,744 MMBF. If the volumetric rate of growth, within the County as a whole, exceeds the rate of removals, that does not mean that the harvest rates on property where harvests are routine are sustainable. Since redwood is, by far, the principal species harvested within the County, the use of the County fraction of total softwood volume for the whole Resource Area was selected to estimate the County fraction of the reported inventory balance. Within the study region, 70% of redwood harvests come from the County of Santa Cruz. The County volumetric fraction was therefore used to extract an estimate of the average annual growth, mortality, and removals by species and ownership class from Table 29 of the USFS document. The results for the County are in Table 1 reproduced below.

	Industrial			Private			Total		
	Growth	Died	Cut	Growth	Died	Cut	Growth	Died	Cut
Fir	4,213	208	0	24,213	2,390	5,642	28,425	2,598	5,642
Redwd	12,315	446	1,775	71,027	2,523	13,886	83,341	2,969	15,661
Actual Annual Redwood Removals								16,900	
Error, Redwood Removals								7%	

**Table 1 - Average Growth, Mortality, and Removals by Species and Ownership Class.**

The data from the USFS are more than adequate to settle the question of sustainability. **The average amount of redwood growth exceeded the volume removed by over five times.** The inventory error could be huge and this would still pass for "sustainable."

Perhaps it is not enough to know the growth-to-removal balance. What fraction of the total forest is being harvested? What is the total impact? The production inventory for the resource area is detailed in Table 32 of the USFS document reproduced below. The County/Resource Area ratio of total softwood volume was applied to Table 32 to represent the beginning and ending inventory in the County of Santa Cruz shown here.

	Industrial	Private	Total
1984 Beginning Inventory	294	3,375	3,669
Gross Growth	136	968	1,103
Mortality	0	(71)	(71)
Removals	(16)	(251)	(268)
Legal Reservations	(111)	(322)	(433)
1994 Ending Inventory	303	3,698	4,001

**Table 2 - Estimated Total Inventory by Ownership Class for Santa Cruz Co. extracted from Table 32 data, adjusted to 10 years.**

According to the USFS, Table 32 used a more detailed sample plot design than did Table 29 over a longer period than that reported (12 years instead of 10). Even after correcting the 12-year time basis, Table 2 reports that the calculated average removal rate of 27 MMBF exceeds the Table 29 total value of 20 MMBF by nearly 35%.

Although the removal rates in the two tables do not match, the ratio of growth to removal rates is similar for both sampling methods. Over the ten years, of the over 4 Billion board feet of timber in inventory, average annual growth was 110 MMBF while annual removals have averaged only 27 MMBF. Once again, on properties under management, **the growth rate exceeds the admittedly overstated estimate of**

**removals by over four times** with the accumulated harvest over ten years representing less than 7% of the ending inventory of producing forest.

If we consider the actual removals of softwood, against the total softwood volume in the County as a whole (from page 5), including parks, residential, and preserved areas, then **the actual softwood removal rate of 17 MMBF is but 0.17% of the total softwood volume of 9,744 MMBF.**

Compared to the estimated growth, actual removals are so small that one could not possibly conclude that there was some form of hopeful error in the survey. The County must have been aware of it, because the author of the 1997 study did send them a copy. The data had been published and available for over two years prior to the adoption of the 1999 zoning law, and the prior 1987 USFS survey had been referenced on the public record by the County.

Thus, one can reasonably conclude that any claims of "unsustainable timber harvesting" are, in fact, more than merely erroneous. They demonstrate that activists' unsubstantiated claims are so far from the truth as to be considered at least negligent and possibly fraudulent.

The cause of the drop in the harvest is the rapid regulatory reduction of land accessible to harvest and the increasing cost of producing redwood because of the cost of regulation. As evidence of this observation, go back to Table 2 and note the degree to which growth exceeded removals, while the usable inventory rose only 11% during the 12-year period. One wonders how active timberland in the County could be growing 110 MMBF of softwood annually, cutting 27 MMBF, and end up with a net increase of but 331 MMBF after twelve years. What happened to the other estimated 433 MMBF of growth?

The USFS reports this once active timber as having been converted to "reserved status," reflecting trees taken out of production by "statute, ordinance, or other legal restriction" (not including the 1999 zoning law in Santa Cruz). It is equivalent to almost seven times the Industrial harvest.


Assuming a mean redwood stumpage prices during the study period of \$500/MBF these legal reservations between 1984 and 1994 in Santa Cruz represent an uncompensated public taking of over \$210,000,000 of private timber capital. The new zoning law confiscates \$2.5 BILLION more.

What is the total effect on the forest? Regulations have severely constrained the amount of land available for production because of the restrictions and costs of a permit. If we add the cumulative effects of legal reservations and conversions of forestland to residential use, it becomes obvious that we asking fewer acres to provide more timber growth. The USFS Table 32 data reports that total **softwood volume increased 8%** in the ten-year interval between inventories on industrial and private timberland, from 6,697 MMBF to 7,303 MMBF. Table 33 shows that privately held **softwood timberland acreage declined** over 6%, from 149 MA (thousand acres) to 140 MA. The bulk of that loss represents conversions for residential housing.

During a special Board of Forestry meeting several years ago, I witnessed the homes of many of these activists. I remember one in particular about which I asked Mr. Collins. I had never seen a redwood forest in such terrible condition. These trees were so spindly they couldn't stand straight and had to lean on each other. There was an understory of dead twigs rendering the stand a fire trap. There was no ground cover to retain soil. The drainage problems off the road to the house were significant. There were weeds all along that road that apparently these "environmental activists" are either too lazy to remove or they are too busy hustling the use of somebody else's land. He said he liked it just the way it was.

Dishonest poseurs such as Mr. Collins are witlessly destroying the timber industry infrastructure we need with which to restore local forests and watersheds to optimal condition. We need to rethink regulatory policy so that more forest land is properly thinned with less impact. Foolish restrictions only confine a more intensive harvest to fewer acres while others are neglected to burn.

Mark Vande Pol, Author and Specialist in Habitat Restoration



25150 Mt. Charlie Rd  
Los Gatos, CA 95035

**CBD BOSMAIL**

---

**From:** CBD BOSMAIL  
**Sent:** Tuesday, April 24, 2007 8:23 AM  
**To:** CBD BOSMAIL  
**Subject:** Agenda Comments

---

**Meeting Date :** 4/24/2007

**Item Number :** 32

**Name :** Walton Haines

**Email :** walton@waltonhaines.com

**Address :** 711 Rider Road  
Corralitos

**Phone :** 831-6882254

**Comments :**

I am against the parcel size change for the following reasons.

The comparison of TPZ zoning needs to be taken in the context that it was not required until now that land had to be zoned TPZ to be under timber management, but was done for tax reasons. A lot of parcels including mine have been under timber management for many years and our parcels need to be included in the discussions and comparisons with other counties. Also do these other counties which are mentioned by "staff" restrict timber harvests to TPZ only.

We are being pushed into a corner where responsible timber harvests are called morally wrong, and destructive.

Government already overly regulates the private property rights and if you look at timber harvesting plans it is clear that the concerns mentioned are already being addressed properly.

Walton Haines