

EFSP

Alternative Silviculture Model

- Our business is about growing volume.
 - Maintain the productive land base.
 - Maximize volume production (at rotation) within the ecological and social constraints.
 - Get best bang for buck.
- Our business is about growing usable timber products.
 - What are our timber goals at rotation?
 - What distribution of future products can we expect from our managed stands? Is this acceptable?

Maintenance of Productive Land Base: **Account for Impacts (volume at rotation) on Land Base**

- Temporary and permanent access structures (e.g. roads).
- Impacts from managing for “other values”:
 - Cattle congregating areas.
 - Impacts of obstacle planting (e.g. to protect trees from cattle).
 - Alienations or structure left for other uses.
- Untreatable disease or insect concerns.

Target Volumes versus Estimated Actual Performance at Rotation

- Target volumes are set for each Biogeoclimatic site series.
- Actual performance of one years harvest is assessed at year 10.
- If performance is $>$ target then no corrective actions are required (However must state why “blowouts” will not be treated).
- If performance is $<$ targets then corrective action plan is required.

Target Volumes versus Estimated Actual Performance at Rotation

- Strong incentive to ensure that best sites are performing well.
- Treatment strategies (how to do's) are aimed at achieving target for all site series regardless of productivity.

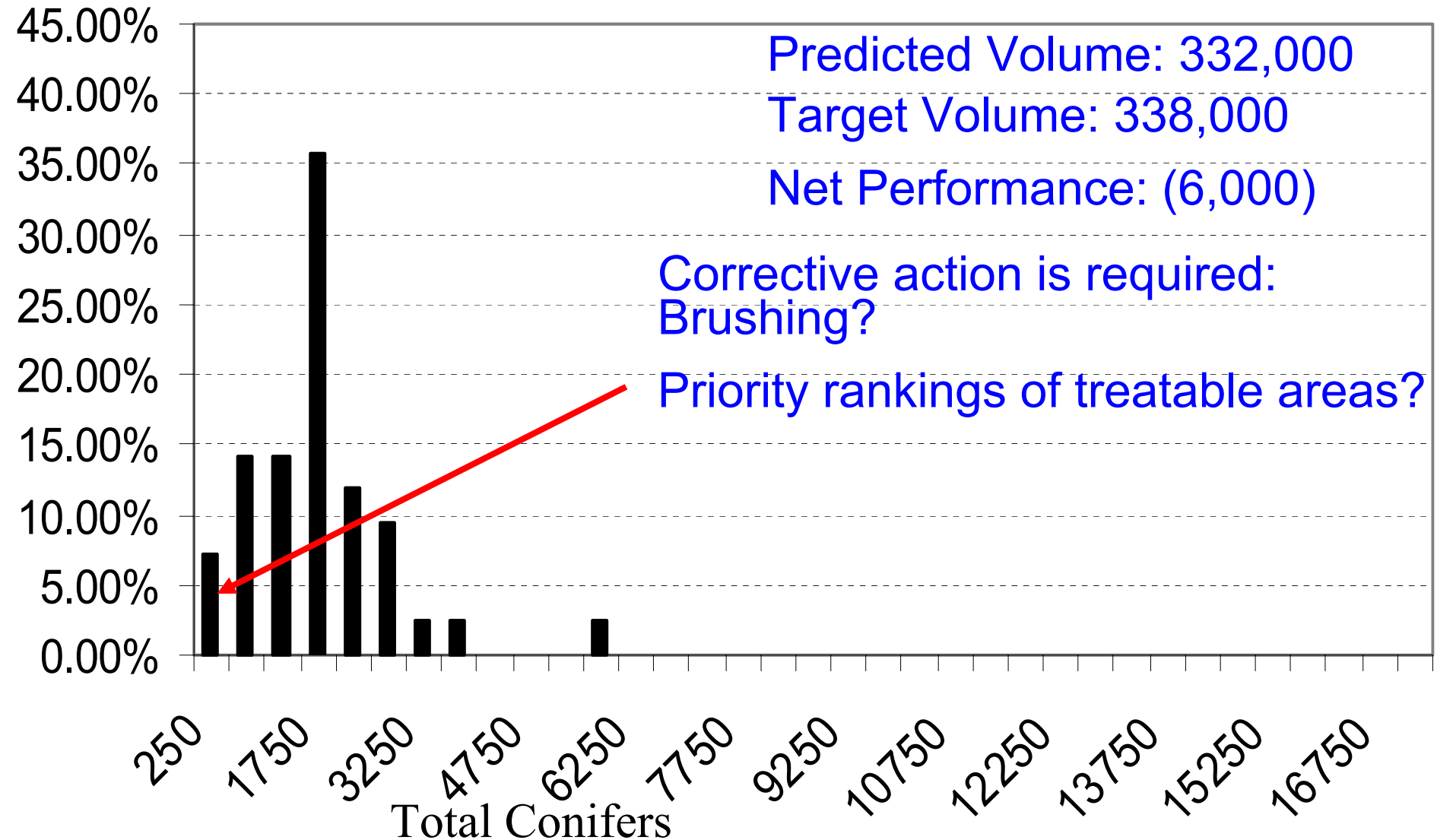
Target Volumes versus Estimated Actual Performance at Rotation

- Re-treatments of under-performing sites will be priority ranked (best bang for buck).
- Age of stand used in assessment of expected volumes is based on stand performance at year 10, not on actual age of trees
 - Incentive to use best available seed.
 - Incentive to plant best micro-site.
 - Incentive to reforest ASAP.
 - Incentive to keep stands growing well.

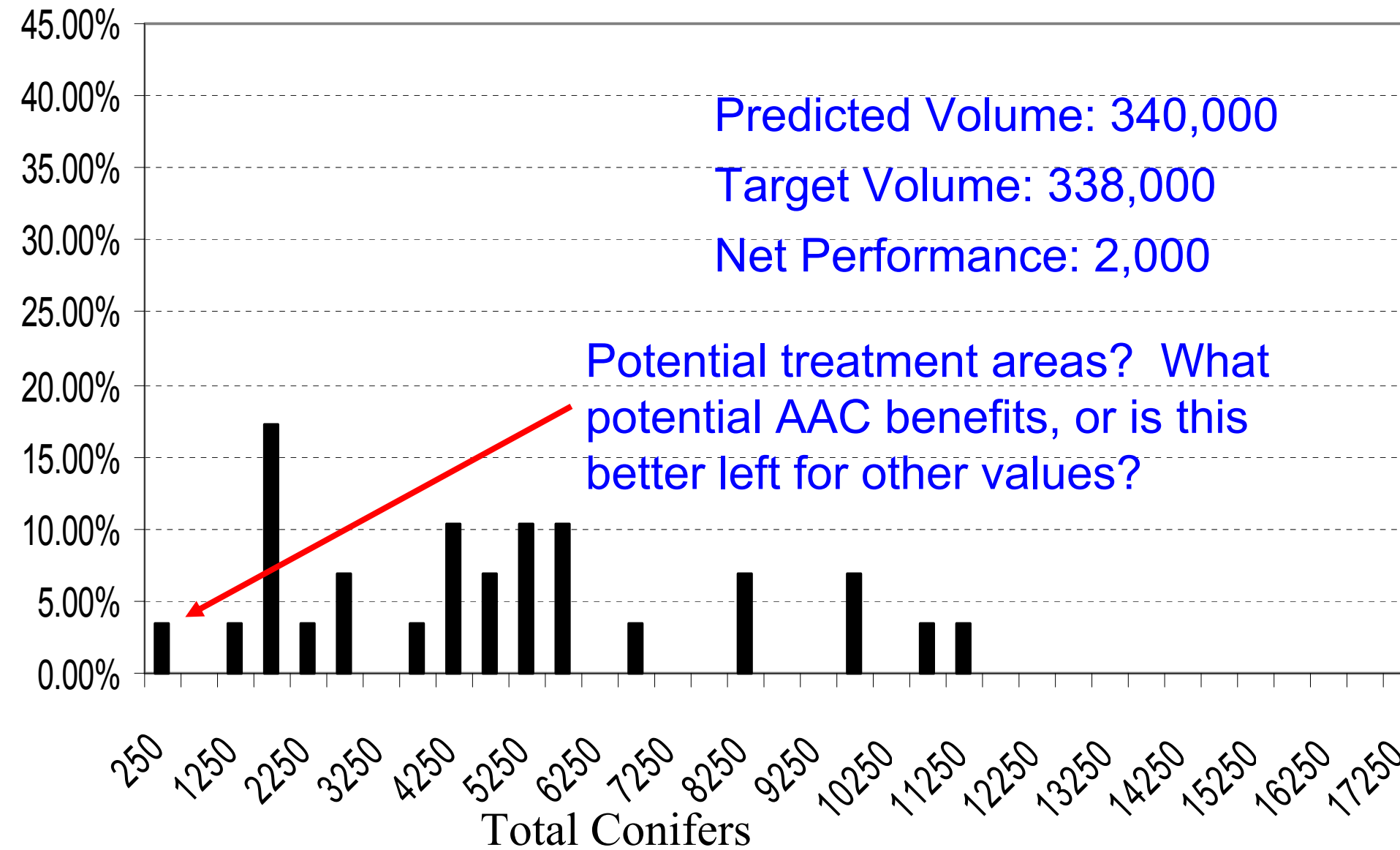
Target Volumes versus Estimated Actual Performance at Rotation

- Example results:
- Assume that these distributions from 10 year old cut blocks represent one years total harvest (e.g. 1000 hectares).

ONE YEARS HARVEST: DISTRIBUTION OF TOTAL STOCKING



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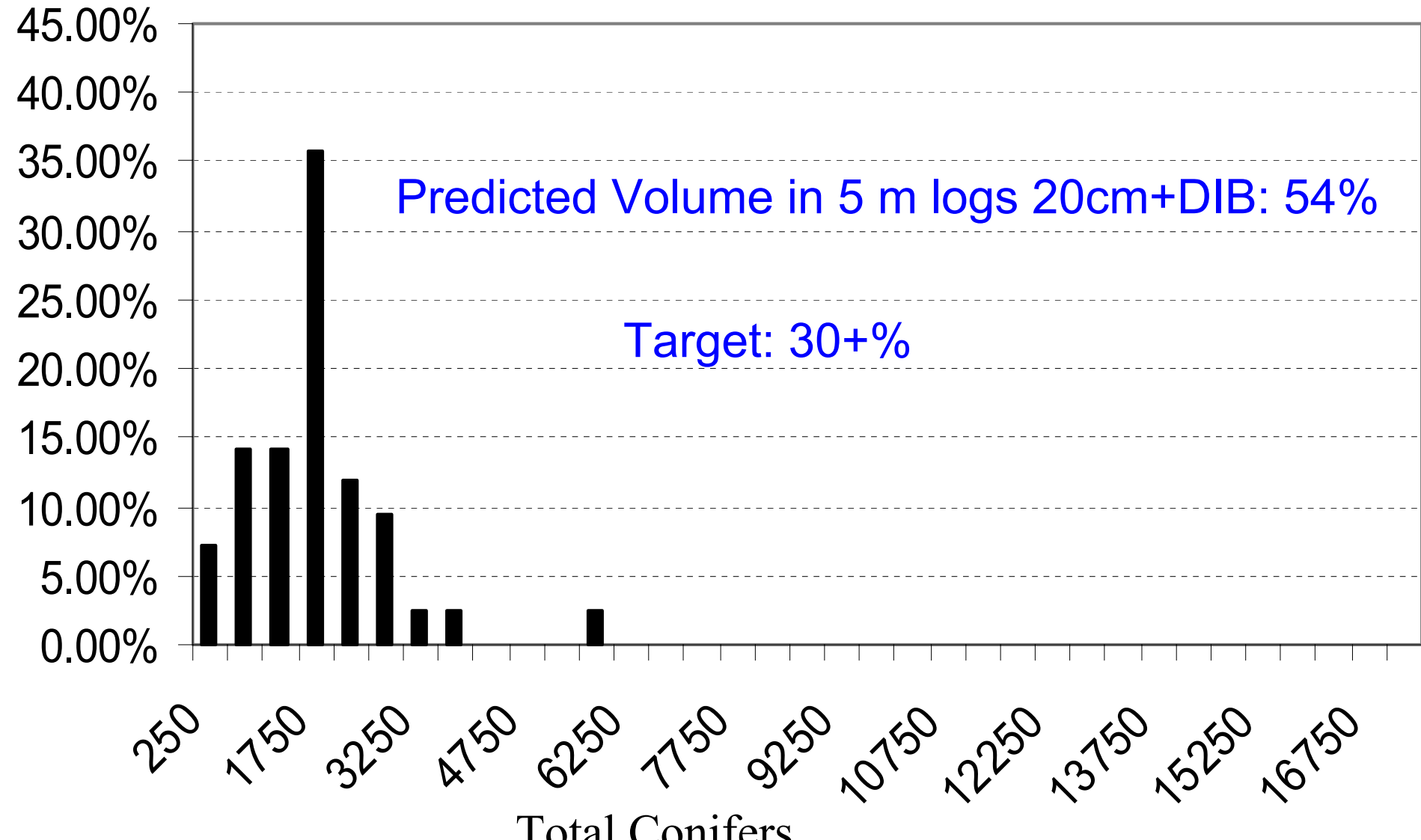
Expected Future Log Quality at Rotation

- Log quality expectations are set.
 - 30%+ of merchantable volume at rotation with 20+cm. top diameter inside bark (DIB).
- If predicted outcomes are less than this then consider corrective action options.

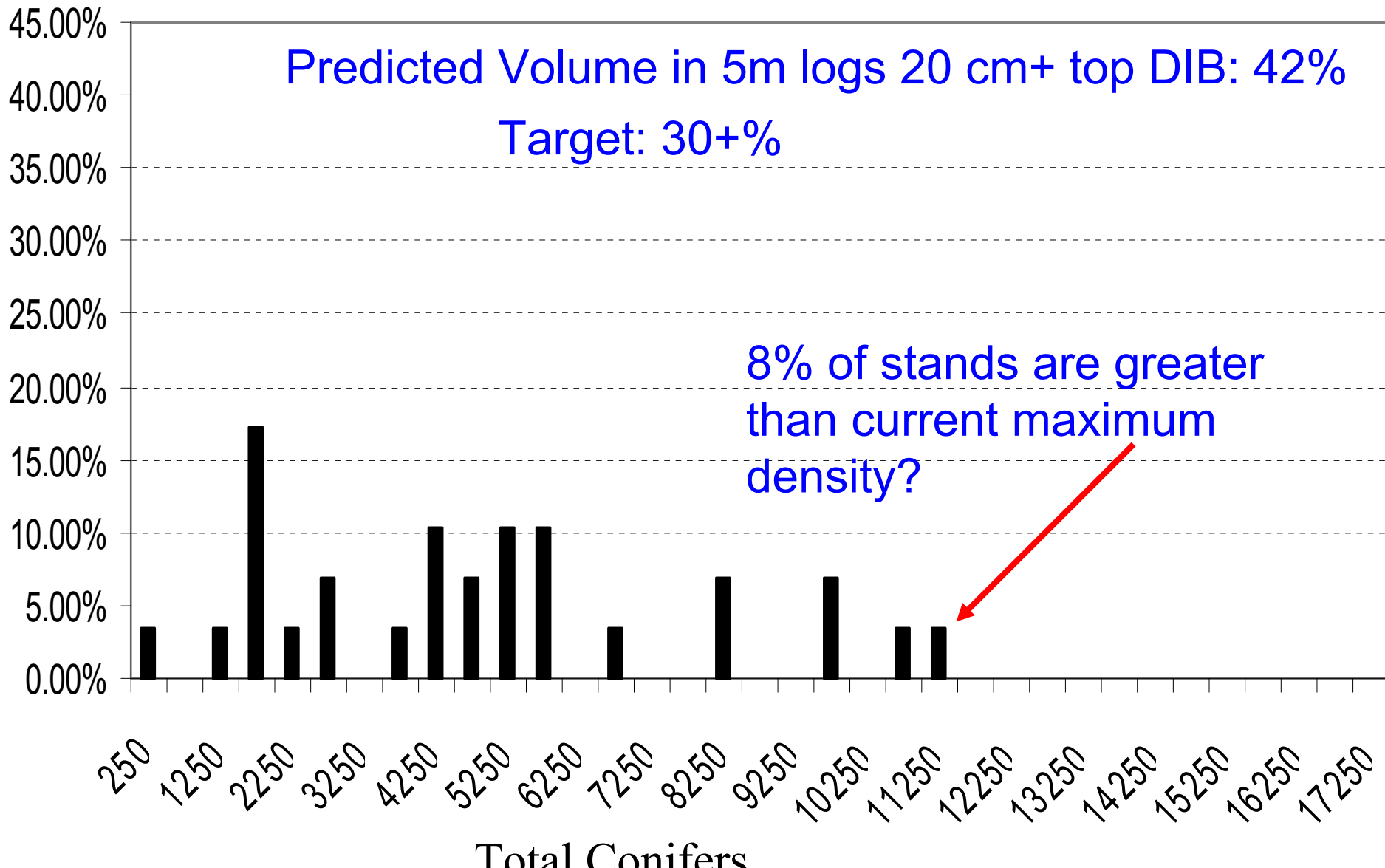
Predicting Future Log Quality

- Determine distribution of products expectations (at age 80) from total years harvest area.
 - determined from the total conifer stocking distributions.
- Does this meet the target?

ONE YEARS HARVEST: DISTRIBUTION OF TOTAL STOCKING



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Ecological Forest Stewardship Project

Where are we going:

- BCEN – March
- JSC Approval – June?
- Public Consultation – July?
- Regulation for approval – August?
- Forest Stewardship Plan - August?
- Implementation – September?

Getting Closer To The Truth – The Future

- Continue testing survey system.
- Develop a performance tracking system.
- Predict impacts of structure on future volumes.
- Predict future performance in partially logged stands.
- Use actual results in future TFL yield analyses. The “real” results based silviculture.
- Establish a system of permanent plots to:
 - Track stand development.
 - Recalibrate volume and product estimates.

TFL Ecological Forest Stewardship Project (EFSP)- Results Based Silviculture

Summary:

- Results based system closely linked to timber goals at rotation (within the ecological and social constraints).
- Strong incentives for better management (Performance and Ultimately AAC).
- Recognition of more productive sites.
- Wiser use of limited funds for bigger gains.
- Accountability for net down's to the productive land base.