SEEDLING PRODUCTION CONTRACT GROWING

Pacific Northwest Region

Moderator:

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John outlined the Forest Service Reforestation Program for Oregon and Washington. Region 6 seedling need is large and growing all the time. Nurseries now exist at Carson, Washington; Bend, Medford, and Beavercreek, Oregon. The last being a greenhouse operation. Seedling capacity at these nurseries is:

Wind River	28,000 M
Bend	10,000 M
Medford	40,000 M
Beavercreek	5,000 M

In addition to the above, Region 6 purchases seedlings from Oregon and Washington State Nurseries, and Forest Service Nurseries located in Coeur d' Alene and Boise, Idaho, and McKinleyville, California. Finally, each year a number of orders are placed with privately owned greenhouse and transplant operations.

Increasing State need is limiting the amount of space available for Forest Service growing at State nurseries in Oregon and Washington. Increasing Forest Service demand in Idaho, Montana, and California is limiting the availability of seedlings for Region 6 use from Forest Service nurseries located in those States.

The direct result of this situation is that Region 6 is now actively engaged in locating yet another large nursery site somewhere north of Salem, Oregon and south of Olympia, Washington.

One final note, John mentioned the Region has placed a number of orders with container operators in Oregon and Washington. To date, only 35 percent of the seedlings ordered met Regional contract specifications. John was followed on the panel by Nels Jeffers whose paper follows.

RECOMMENDATIONS FOR IMPROVING FOREST SERVICE BID OFFERINGS. Western Forest Nursery Council, August 9, 1978, D.N. Jeffers.

There are many aspects of the seedling growing contracts issued by the Forest Service which, if changed, would result in two primary benefits. First, Forest Service costs would be reduced and seedling quality improved; and second, reliability, quality, and number of competent growers bidding would increase. The problems now existing in the bid offerings are, I believe, the result of a lack of understanding of the production processes and costs. These factors should be well understood by the contracting officers and silviculturists at the National Forest level and by the scientists setting seedling standards at the regional level. The greatest confusion exists in containerized seedling contracts, but similar problems exist with bare root production.

My first concern, applicable to both types of seedlings, is the quality of the government-furnished property--both seed and seedlings. Currently the Forest Service, through a contract clause, divests itself of any responsibility for discrepancies in the seed quality. To bid intelligently, numbers of seed, germination percent, and purity must be accurately stated. Old seed tests based on unknown procedures are unacceptable. High levels of impurities and empty seeds completely destroy planned yields and subjects the grower to unacceptable risk. In contracts for bare root transplanting, the USFS does not disclaim responsibility for seedling quality. There simply is little effort to describe the supplied seedlings in terms required to prepare an intelligent bid. Information needed is culling standards, the size range and size classes, the root pruning applied, lifting dates and storage periods.

Stipulating in the bid offering that the Government has no responsibility for any statements concerning the furnished property simply says bidder beware. Bid only if you are willing to gamble. The first effect is to immediately cause the bidder to protect himself by lowering his estimate of the yield he may get from either seed or seedlings furnished. Lowering the yield estimate raises the bid price.

Seedlings cannot be grown from empty seed nor transplants grown from dead seedlings or culls. The entire risk of crop failure and monetary loss is currently borne by the grower who has absolutely no control over the cause of failure. His sole defense is to bid high using a wild guess as to seed or seedling quality. I know of one grower who refuses to bid, largely due to this Caveat Emptor clause and the unreliability of the information supplied about the furnished property--seed or seedlings.

There is current legal opinion that the disclaimer clause does not excuse the Government from its responsibility and leaves it open to claims or suits for losses the grower sustains due to inaccurate information.

Correcting this weakness would benefit the Government considerably and would encourage greater participation by informed growers in the bidding process. Correcting the container contracts can be made by an adjustment clause based on an analysis of a sample of seed drawn from delivered seed. This would then be compared to the performance in the grower's houses. For transplanting stock, an accurate list of the important information should suffice.

I consider the following problem to be the greatest contributor to unnecessarily high costs for containerized stock. It has to do with the interaction of the amount and quality of seed supplied and the commitment to take or not to take substandard stock. There are about as many variations in the bid stipulations in these areas as there are contracts in existence. There should be no variation.

There are two interrelated problems. First, the volume of seed supplied is often inadequate to allow filling the order at the lowest costs. Secondly, the reservation that the government may or may not take substandard stock

results in bidding confusion. To illustrate my points, let's examine a hypothetical, but not uncommon bid offering. The bid offering states that 234,000 seeds will be supplied and the germination percent is 70. The order is for 100 M seedlings. The bid offering in some cases specifies that two seeds are to be sown per cell; in other cases, a sow of two seeds per cell is recommended. The grower calculates that the amount of seed provided will produce only 82 M seedlings meeting the specifications of 2.5 mm in diameter if sown at two per cell. The cost of these seedlings would be $66/M. On the other hand, he calculates that sowing one seed per cell would produce the 100 M ordered but at a cost of $88/M.

The bidder is left with a dilemma in preparing his bid. Where the sowing of two seeds is a requirement of the contract, he is forced to assume that the Government will either accept fewer seedlings than ordered or will take substandard stock at a lower price. On the other hand, when the sowing of two seeds per cell is only a recommendation, he is at a loss to know on which basis his competition will bid; will the competition sow two per cell and then bid the lower price at lower yield or will he sow one seed per cell and bid the high price at high yield. To rectify this problem, the Forest Service must be very specific on the contract compliance terms and then, if the seed provided is inadequate to meet the grower's requirements, the Government must provide a means or basis for assuring that sufficient seed is available and that all bids are for identical goals.

Using the same hypothetical example, it must be pointed out that, in this case, providing for sowing three seeds per cell could reduce the price from the low of $66/M to $60/M at only a very slight addition of seed. Only when seed is in short supply should this 10% cost savings be overlooked.

The second problem in this seed versus yield problem is the contract provision that the Forest Service may or may not purchase substandard seedlings under the specifications of 2.5mm. If the Bidder is assured, <u>in the contract</u> that the substandard seedlings will be purchased, he can bid a lower price. If the Forest Service says only that it may purchase the substandard stock, the bidder must protect himself and bid the higher price. In the example used above, where two seeds per cell is specified the bid price could drop from $66/M to $55/M and the yield would increase to 99 M rather than 82 M. The seedlings delivered would be 82 M at 2.5 mm plus 17 M down to 2.3mm.

The bidder dare not bid $55 unless he knows he can deliver the substandard seedlings. On the other hand, he may lose the bid if one of the other bidders is an inexperienced contractor who is not aware that the Forest Service may not take the substandard seedlings and therefore he bids the lower price. Under these circumstances, both the Forest Service and the bidders suffer.

Considering either type of stock, containerized or bare root, I suggest that the Forest Service will obtain more reliable bids at lower costs by reducing the uncertainty in the bidding process and by reducing the contractor's risk which drives the prices up as well as discourages bidding by many reliable growers. A meeting on a Regional basis between contractors and the Forest Service to resolve bidding problems would, I believe, greatly improve the Forest Service's costs and satisfaction.

Other problems which need discussing at some future date are:

1) Seedling specifications which are biologically unreasonable. We are often asked to produce a hippopotamus from a giraffe by altering its vitamin intake and force-feeding it.

2) Refrigerated trucking is rarely needed.

3) Boxes are overdesigned.

4) Statistical problems exist in the inventory process.

5) Packing systems are unnecessarily expensive.

6) Late orders result in seedlings that may meet specs but which are physiologically disoriented.

HYPOTHETICAL BID OFFERING

ORDER: 100 M SEEDLINGS MINIMUM DIAMETER: 2.5 mm

SEED SUPPLIED: 6.69 pounds, 35,000 seeds per pound, germination 70%, seed sufficient for 2 seeds per cell.

PRICING: 2.5 mm 100% Bid Price

2.4 mm 95% Bid Price

2.3 mm 85% Bid Price

BIDDER'S DILEMMA

70% of seedlings grown will be 2.5 mm or larger
85% of seedlings grown will be 2.4 mm or larger
90% of seedlings grown will be 2.3 mm or larger

Case I - High Yield - High Cost
Sow 1 seed per cell: Yield 100 M at 2.5 mm, Cost $88 per M

Case II - Low Yield - Low Cost
Sow 2 seed per cell: Yield 82 M at 2.5 mm, Cost $66 per M

Case III - High Yield - Low Cost
Sow 3 seed per cell: Yield 100 M at 2.5 mm, Cost $60 per M

Case IV - High Yield? - Low Diameter - Low Cost
Sow 2 seed per cell: Yield 100 M at 2.3 mm, Cost $55 per M

Since three of the panelists listed on the program [ailed for various reasons to show, Frank called for remarks from audience.

Bernie Meyer, BLM Portland, Oregon

First to respond was Bernie Meyer, of the BLM. Bernie is responsible for BLM silviculture. His duties cover seed collection, seedling purchase, tree improvement and silvicultural practices.

Bernie pointed out that the BLM needs about 25,000,000 seedlings a year to meet their needs. These come in large part from arrangements with State, Federal, and private nurseries in Oregon and Washington. They recently began purchase of greenhouse-grown seedlings. Their "request for bids," include a request that perspective bidders furnish a "bid proposal" that describes their facilities and procedures for meeting bid requirements and describes their experience. These are reviewed by a panel of experts. In some cases, their panel recommends against accepting the lowest bids submitted. This has provided a larger percentage of seedlings that meet specifications, than is the case for those who have been purchasing seedlings at the low bid only. Their primary experience is with bare root seedlings. They too, have experienced falldown with container-grown stock.

Bob Kintigh, Nurseryman, Springfield, Oregon

Frank then asked Bob Kintigh to give his views as a seedling grower. Bob, who formerly produced bare root seedlings for the Christmas tree trade, now produces seedlings annually for use both in this trade and for those involved in reforestation as well.

Bob is on the "bidder's list," to receive all Federal "requests to bid." To date, he has declined to bid on such contracts. He gave as his reason, the contract clauses involved. One bid requested that all boxes have "this side up," printed on all shipping boxes. Bob's do not. All contain equal employment opportunity, holidays for labor, and other clauses that might possibly limit Bob's freedom to operate. Hence he prefers to forego bidding on Federal contracts.

Mel Greenup, Silviculturist, Siskiyou National Forest

(Response to Nelson Jeffers" Presentation)

Nels, you know that we are after much more than the lowest bid on our container contracts. We are after a high quality tree that will survive and grow.

You have correctly identified confusing things in our contracts that need straightening out and we certainly want to do this. However, I must explain that the risk involved in growing containerized stock has not been borne entirely by the contractor as you indicated.

I began working with containerized contracting 7 years ago by asking the grower what he could produce. I wrote the contract to fit his description-the grower failed to meet his own specifications. In 1976, no stock under contract came close to meeting specifications. The seedlings were chlorotic, spindly, and could not stand when separated. We accepted 55 percent of the seedlings and outplanted them. They all died. In 1977, none of 795,000 seedlings under contract came close to meeting minimum contract specifications. We are salvaging 200,000 by transplanting at Humboldt Nursery to become plug-ones.

I know you, as a contractor, realize I am not really your customer--we are partners on the same team. We will continue to work toward accurate communication in the development of a high quality seedling that will survive and grow.

On this optimistic note, the panel ceased deliberations, and Frank turned the proceedings over to Don Perry who adjourned the session.