

EVALUATION OF TREE TRANSPLANTS FARVIEW OVERLOOK AREA

In 1995 park staff transplanted a number of native trees to the abandoned roadway north and south of Farview Overlook. The source of the trees was from near Yovimpa Pass. The trees were moved with a 30 inch tree spade in October 1995 and watered throughout 1996. This report summarizes the survivability of these transplanted trees.

Report: Bryant, R.M. and S.L. Petersen. 1996. Restoration of disturbed areas, Bryce Canyon road project. On file in park Resource management Office. 33pp.

Reference: Aug. 1996; Pg. 18; Table 4- Trees Transplanted to Obliterated Roadways @ Farview.

Location: The restoration areas are abandoned roadways north and south of the Fairview Parking Lot.

May 21, 1997-Field Observations: (data collectors; J. Ames-Curtis & C. Lindh).

SPECIES	TOTAL	% Dead Plants
white fir (<u>Abies concolor</u>)	19 (24) no!	50
englemann's spruce (<u>Picea engelmannii</u>)	14 (24) no!	21
ponderosa pine (<u>Pinus ponderosa</u>)	123 126	42
aspen (<u>Populus tremuloides</u>)	12 12	75
douglas fir (<u>pseudotsuga menz-</u> <u>esii</u>)	12 (8) does not agree	38
limber pine (<u>pinus flexalis</u>)	1	0

COMMENT: There appears to be an error in table 4;pg. 18; there is 1 transplanted limber pine (Pinus flexilis) thriving. This species may be of further consideration for roadside restoration success.

RECOMMENDATION: To ensure tree transplant restoration success in the future; perhaps a soils nutritional analysis would be beneficial prior to revegetation work. Also, timing of transplantation is optimal during late autumn or early spring.

	total	Dead	% Dead	
<i>Pinus ponderosa</i>	126	53	42%	
~~Abies~~ <i>Abies concolor</i>	24 (19)	12	50%	63%*
<i>Beudantsuga menz</i>	8 (13)	3	38%	23%*
~~Aspen~~ <i>Populus tremuloides</i>	12	9	75%	
<i>Picea pungens</i>	24	5	21%	

1st fl. decus *complanata* & locations
transplants

ref. (pg 18; table 4 1994-1995)

1997 Bryce Canyon Road Project Update of Mortality Rate:
trees transplanted to Obliterated Roadways @ Farview
(ref. pg 18; table 4; Restoration of Disturbed Areas Bryce
Canyon Road Project -1994-1995.); a comparison observation

	total	%
white fir (<i>Abies concolor</i>)	126	50%
blue spruce (<i>Picea pungens</i>)		21%
ponderosa pine (<i>Pinus ponderosa</i>)		42%
aspen (<i>Populus tremuloides</i>)		75%
douglas fir (<i>Pseudotsuga menziesii</i>)		23%
limber pine (<i>Pinus flexilis</i>)	1	~~100%~~ 8%

















		Total	Dead	A.	%
Ponderosa	42%	126 (123)	53	73	~~33~~ 61%
White fir	50% (19)	~~34~~ (12)	12	12	~~35~~ 60%
Douglas fir	23% (13)	8 (12)	3	5	~~36~~ 37%
✓ Aspen	75%	12 (12)	9	3	75%
Picea Pungens	21%	24 (14)	5	1.2	20%

48
60
68

South Road White Fir

Ponderosa

~~XXXX~~

A D ~~8~~

XXXX XXXX
 XXXI XXXXXX
 XXX XXXXXX
 XXX XXXXXX
 XXX II
 XXX ~~63~~/
 32

A D

XXXX XXX
 III XXX
 19/
 10

Blue Spruce
~~Blue Spruce~~
 Picea pungens

A D

XXXXXXX XXX
 XXX
 19/
 5

D.F.

A D

III II
 5/
 2

Aspen

A D

I ~~8~~ ~~8~~ XXXI
 (no branches
 but new shoots
 @ base.)
 8/
 7

Juniper

III
 3/
 0

Pinus ponderosa