CONTAINERIZED SEEDLING PRODUCTION STATISTICS FOR ONTARIO, 1984

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under the auspices of the

CONTAINER STOCK WORKING GROUP OF THE

CANADA-ONTARIO JOINT FORESTRY RESEARCH COMMITTEE

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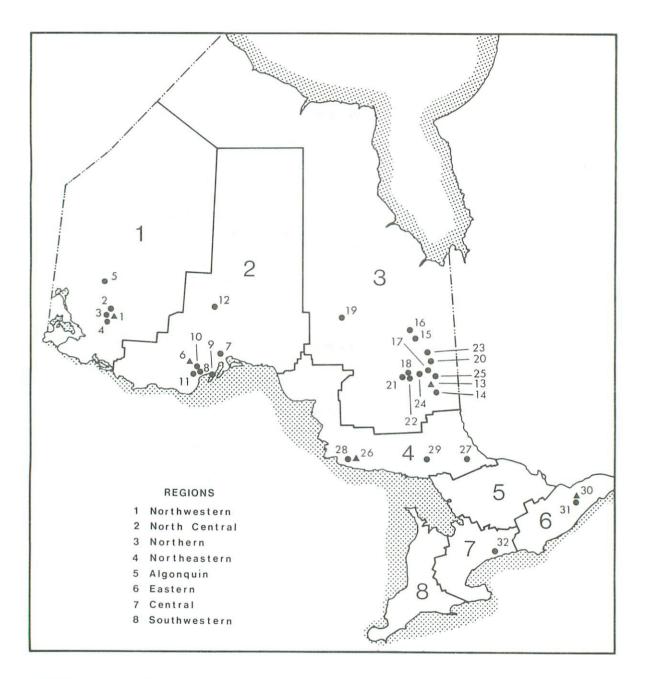
GREAT LAKES FORESTRY CENTRE

CANADIAN FORESTRY SERVICE

GOVERNMENT OF CANADA

1985

JOINT REPORT NO. 8



Frontispiece. Container production nurseries in Ontario, 1984. (Large numbers indicate administrative regions; small numbers indicate locations of nurseries listed in Table 4: A - provincial crown nurseries, O - private sector nurseries.)

TABLE OF CONTENTS

		Page
PRODUC	TION HIGHLIGHTS	1
EXPLAN	ATORY NOTES ON TABLES	4
Table	 Summary of greenhouse capacities (m²) for contain- erized seedling production by region and owner- ship category, 1984	7
Table	2. Summary of container system use (cavities sown) by region, 1984	8
Table	3. Summary of container system use (shippable seed-lings produced) by region, 1984	8
Table	4. Container production nurseries by region:	
	Northwestern Region	9
	North Central Region	11
	Northern Region	13
	Northeastern Region	18
	Eastern Region	19
	Central Region	20
Table	5. Summary of planting stock production, all sources, for calendar year 1984 by region and type ("000 shippable seedlings)	21
Table	Summary of planting stock production for calendar year 1984 by region, type and source ("000 ship-pable seedlings)	22
Table	7. Summary of planting stock production, all sources, for calendar year 1984 by region, type and species ('000 shippable seedlings)	23
Cover	photo: Counting needle primordia on black spruce container s (photo courtesy of Ray Hong, Ontario Ministry of Nat Resources, Kirkland Lake).	tock ural

PRODUCTION HIGHLIGHTS

This is the third in a series of annual reports summarizing containerized tree seedling production statistics for the province of Ontario. Previous reports have documented a sharp increase in the numbers of containerized seedlings produced for provincial reforestation programs since the beginning of the decade. At the same time, an increasingly larger proportion of those seedlings has been grown in private sector nurseries under contract to the Ontario Ministry of Natural Resources (OMNR). For the last report year, 1983, total production of container stock amounted to 54.7 million seedlings, of which 76% was produced in 23 private greenhouses.

Total planting stock production, of all stock types, continued to show a steady rise in 1984 (Fig. 1), reaching a record 142.8 million trees. This represents an increase of 18.5% over the previous year's figure, and more than a 55% increase since 1982. Despite the magnitude of the increase, production of bare-root stock actually declined slightly in 1984, and for the first time was surpassed by output of container stock. The latter, at 81.5 million seedlings, was almost 50% greater than in 1983, and accounted for 57% of total planting stock production (up from 45% in 1983). These are overall averages for the province as a whole; it will be noted that the proportion of containers in the four northern regions (Northwestern, North Central, Northern, Northeastern) (Table 5), ranged from 63% to 85% of total planting stock production.

In line with the policy of privatizing containerized seedling production, 26 private nurseries with a total heated greenhouse floorspace of approximately $56,000~\text{m}^2$ produced 70.4 million seedlings. This represents a 69% increase in private output over the previous year, giving the private sector an

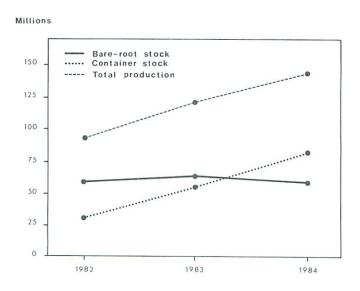


Figure 1. Planting stock production for the years 1982 to 1984 (millions of seedlings).

86% share of container production (Fig. 2). As will be noted from Table 6, most (80%) of this private production was centered in the Northern and North Central regions. Container production at CMNR nurseries continued to decline, both in terms of numbers of seedlings (11 million) and as a proportion of the total (14%, Fig. 2).

The fact that the bulk of container planting takes place in the four northern regions of the province is reflected in the statistics for container production by species (Table 7). In 1984 the two main species grown were jack pine and black spruce, which accounted for 49% and 47% of total container production, respectively. The next closest species, in order of magnitude, was white pine at 1.5%.

The pattern of container use changed little during the period 1982-1984 (Fig. 3), the Japanese paperpot still being the most widely used container. Although employed only in the North Central, Northern and Northeastern regions, the paperpot system accounted for 80% of all container stock grown in the province in 1984.

Most of the data for this report were supplied by OMNR regional members of the Container Stock Working Group of the Canada-Ontario Joint Forestry Research Committee. Planting stock production data for the Central and Southwestern regions were provided by the respective provincial nursery superintendents. The assistance of all contributors is gratefully acknowledged.

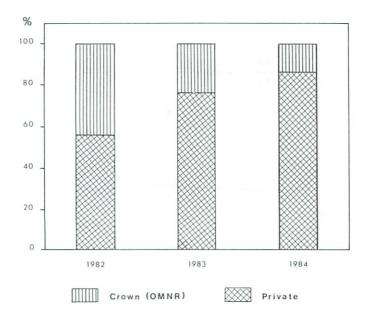


Figure 2. Distribution of container stock production between crown and private nurseries, 1982-1984.

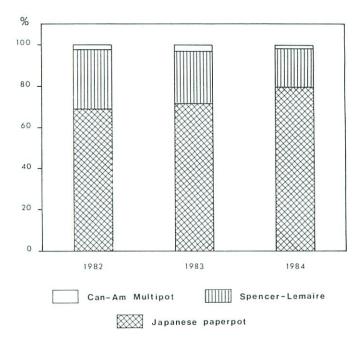


Figure 3. Container system use, 1982-1984 (as a percentage of total container stock production).

EXPLANATORY NOTES ON TABLES

The format is identical with that of the 1983 report.

- 1. All data are for calendar year 1984. Container stock production is presented in terms of the total number of cavities sown and numbers of shippable seedlings produced¹. The latter includes seedlings produced in 1984 for shipping in the current year (1984) or for overwintering and shipping the following spring (1985). It does not include overwintered seedlings shipped in the spring of 1984. Data for bare-root production include only seedlings shipped during calendar year 1984.
- 2. Data for container production exclude containerized seedlings grown for use in the production of accelerated bare-root transplant stock.
- 3. Accelerated bare-root transplant data (Accel. transplants; tables 5-7) include production from both containerized and bare-root seedlings.

4. NURSERY OWNERSHIP

All container production reported was carried out in provincial crown (i.e., OMNR) or private sector nurseries under contract to OMNR. Only those private nurseries with seedling production contracts are reported here. There were no container nurseries operated by the forest industry in Ontario in 1984.

5. GREENHOUSE TYPE

- i. Heated houses with conventional heating systems.
- ii. Unheated houses with assisted cooling (e.g., thermostatically controlled vents and extractor fans, or other mechanical cooling devices).
- iii. Shelterhouses unheated houses or other protective structures with only passive cooling (i.e., no mechanical cooling devices). In 1984, no nursery reported using such structures in the production of container stock.

¹ The use of "shippable seedlings produced" rather than "seedlings shipped" is determined by the desire for an accurate portrayal of container nursery production on a crop-year basis. This approach avoids the problem of seedlings produced to acceptable standards but for some reason not shipped (inherent in the reporting of "seedlings shipped"), and serves better to quantify actual nursery productivity in a given year.

6. TABLE 4 - CONTAINER NURSERY DIRECTORY

The following information precedes the entry for an individual nursery:

- nursery number (same sequence as on frontispiece map)
- (C) or (P) indicates crown or privately operated nursery, respectively
- mailing address
- name of nursery superintendent or owner
- telephone number
- container system used and percentage of use:

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PP3 - FH308 Japanese paperpot
```

PP4 - FH408 Japanese paperpot

SLF - Spencer-Lemaire "Ferdinand"

MP1 - Can-Am Multipot 1

LT - Ray Leach Super "Stubby"

For each entry:

- greenhouse description, in parentheses, follows figure for greenhouse capacity, viz:

1st letter (greenhouse style)

F - free standing

G - gutter connected

2nd letter (greenhouse cover material)

f - fiberglass or rigid plastic

g - glass

p - polyethylene

3rd letter (heating method)

a - forced air/oil

b - forced air/propane

c - forced air/natural gas

d - forced air/gas waste heat

e - hot water/oil

f - hot water/propane

g - hot water/natural gas

h - hot water/wood

- species abbreviations:

bs - black spruce

wS - white spruce

jP - jack pine

rP - red pine

wP - white pine

sP - Scots pine

L - larch (tamarack)

OC - other conifers

- crop schedule:

This provides an estimate of (1) the percentage of current and overwinter production for each species, based on cavities sown, and (2) the average length of production period for each growing regime, calculated on the basis of the number of weeks between sowing and shipping.

Table 1. Summary of greenhouse capacities (m²) for containerized seedling production by region and ownership category, 1984^a

		OMNR capacity	7	1	Private capac	ity		Total capaci	ty
Region	Heated houses	Unheated	Shelter- houses	Heated houses	Unheated houses	Shelter- houses	Heated houses	Unheated houses	Shelter- houses
Northwestern	2 230	-	-	5 060	-	-	7 290	-	_
North Central	1 500	-	-	16 611	-	-	18 111	-	-
Northern	4 700	-	-	30 494	-	-	35 194	-	-
Northeastern	4 491	-	-	2 980	-	-	7 471	-	-
Eastern	900	300	1 200	740	280	=	1 640	580	1 200
Centralb	1 663	-	4 830	-	-	-	1 663	-	4 830
	15 484	300	6 030	55 885	280	_	71 369	580	6 030

a Whereas private greenhouses produced only container stock, several OMNR nurseries used their greenhouses principally for cuttings and the production of seedlings for accelerated bare-root stock.

b Orono nursery

Table 2. Summary of container system use (cavities sown) by region, 1984.

Region	Spencer- Lemaire	Japanese paperpot	Can-Am Multipot	Other
		('000 caviti	es sown)	
Northwestern	15 548	-	-	-
North Central	2 880	24 770	320	-
Northern	+	43 462	-	-
Northeastern	-	9 259		483
Eastern	-	-	1 065	-
Central	-	-	68 ^a	-
	18 428	77 491	1 453	483
% of total	18.8	79.2	1.5	0.5

Table 3. Summary of container system use (shippable seedlings produced) by region, 1984.

Region	Spencer- Lemaire	Japanese paperpot	Can-Am Multipot	Other
		- ('000 shippable	e seedlings)	
Northwestern	12 376	-	-	_
North Central	2 520	21 373	280	_
Northern	_	35 662	-	-
Northeastern	-	7 843	-	365
Eastern	-	-	977	-
Central	-	-	62 ^a	-
	14 896	64 878	1 319	365
% of total	18.3	79.6	1.6	0.5

aOrono nursery

9

a All containers restocked to 100%

Table 4. Container production nurseries by region (cont'd).

Green	house capacity and style	(m ²)		Seedling p	roduction ties sown)		production bable seedlings)		op
Heated houses	Unheated houses	Shelter- houses		Heated houses	Unheated houses	Heated houses	Unheated houses	Current crop	Over- wintered
				4(P) TAMA	RAC NURSERIES, RE	(1.5)			
				[David L	ONTARIO, PEN 2YS				
					[SLF-100%]	30. 002.1			
722 (Fpe/h)	_	-1	jР	1092		1050	2	100/14	_
			bS	690	ma Sayin p	620	-	-	100/52
				1782	-	1670	-		
					R CONCEPTS INC., ALLS, ONTARIO, PO	CONTROL OF THE PROPERTY OF THE			
				[Gordon II	icks. Tel. (807)	222-2325]			
					[SLF-100%]				
1650 (Fpc)	-	-	jP bS	5498 555	(m,1 ox ·	2779 500	-	100/14 32/22	- 68/52
990 - 000					-		-		

Table 4. Container production nurseries by region (cont'd).

Gree	nhouse capacity and style	(m ²)		production vities sown)		g production pable seedlings)		op dule
Heated houses	Unheated houses	Shelter- houses	Heated houses	Unheated houses	Heated houses	Unheated houses	Current crop	Over- wintered
NORTH CENTR	AL REGION							
		6(C) THUNE		STATION, ONTARIO N NUNDER BAY, ONTARI		RAL RESOURCES,		
			[Bob Kla	apprat. Tel. (807	939-2561]			
				[SLF-90%; MP1-10	8]			
1500 (Fpc)	-		P 1600 S 1600	-	1400 1400	-	100/16	- 100/52
			3200	-	2800	-		
		[Frank	Rauer and John	Asperjan. Tel. [PP4-100%]	(807) 857-2471/	857-2286]		
2007 (Fpc)	-	- j		-	994 1180	Ī	100/16	- 100/52
			2630	-	2174	-		,,,,,,
		8(P)	CREEKSIDE NURSE	SRY, RR#11, THUNDE	R BAY, ONTARIO,	P7B 5E2		
		8(P)		RRY, RR#11, THUNDE		P7B 5E2		
		8(P)				P7B 5E2		
3211 (Fpc)	-	8(P) - j b	[Dennis Trev	risanutto. Tel. (P7B 5E2	100/20	- 100/52

Table 4. Container production nurseries by region (cont'd).

	nhouse capacity and style	(m²)		Seedling ('000 cav	production ities sown)		g production pable seedlings)		opedule
Heated houses	Unheated houses	Shelter- houses		Heated houses	Unheated houses	Heated houses	Unheated houses	Current	Over- wintered
			9(P) G	WINDY'S NURS	ERIES LTD., PASS	LAKE, ONTARIO,	POT 2M0		
			[E	Errol Grundy	. Tel. (807) 977	7-2832/977-2690]			
					[PP4-100%]				
1605 (Fpc)	-	-	jР	1300	-	1158	-	100/16	-
			bS	1420	-	1250	-	-	100/52
				2720	-	2408			
					[PP4-100%]		2626]		
3612 (Fpc)	-	-	jp bs	1980 4400	[PP4-100%]	1734 3905	-	100/16 45/20	- 55/52
3612 (Fpc)	-	-	jP bs	1980 4400 	[PP4-100%] - -	1734 3905 	=	100/16 45/20	- 55/52
3612 (Fpc)	-	-		4400	[PP4-100%] - - -	3905	-		- 55/52
3612 (Fpc)	-	-	bs	6380	[PP4-100%] NTERPRISES LTD., ONTARIO, P7C 5N	3905 5639 RR#6, THUNDER B	-		- 55/52
3612 (Fpc)	-	-	bS 11(F	6380 P) HODWITZ E	TERPRISES LTD.,	3905 5639 RR#6, THUNDER B	-		- 55/52
3612 (Fpc)	-	-	bS 11(F	6380 P) HODWITZ E	NTERPRISES LTD., ONTARIO, P7C 5N	3905 5639 RR#6, THUNDER B	-		- 55/52
3612 (Fpc)	-	-	bS 11(F	6380 P) HODWITZ E	NTERPRISES LTD., ONTARIO, P7C 5N Bodwitz. Tel. (3905 5639 RR#6, THUNDER B 15 807) 939-6027]	-		- 55/52
		-	bS	6380 P) HODWITZ E	NTERPRISES LTD., ONTARIO, P7C 5N Bodwitz. Tel. (3905 5639 RR#6, THUNDER B 15 807) 939-6027]	-	45/20	- 55/52
3612 (Fpc)		-	bs 11(F	4400 6380 P) HODWITZ E [Jim and Dan	NTERPRISES LTD., ONTARIO, P7C 5N Bodwitz. Tel. (3905 5639 RR#6, THUNDER B 15 807) 939-6027]	-	45/20	~

Table 4. Container production nurseries by region (cont'd).

	nhouse capacity and style	(m ²)		production vities sown)		g production pable seedlings)		op edule
Heated houses	Unheated houses	Shelter- houses	Heated houses	Unheated houses	Heated houses	Unheated houses	Current crop	Over- wintered
				JRSERIES ARMSTRONG		142,		
			[Mr. & Mrs.	Ted Neill. Tel.	(807) 583-2193]			
				[PP4-100%]				
1605 (Fpc)	-		jP - os 1340	-	1150	-	-	100/52
			1340		1150	-		
NORTHERN RE	GION							
		13(C) SWA		ATION, ONTARIO MIN		L RESOURCES,		
		13(C) SWA	P.O. BOX	ATION, ONTARIO MIN 129, SWASTIKA, ON Porcier. Tel. (7	TARIO, POK 1TO	L RESOURCES,		
			P.O. BOX	129, SWASTIKA, ONT	TARIO, POK 1TO	L RESOURCES,		
722 (Gfb)	_	- :	P.O. BOX	Porcier. Tel. (7	705) 567-3372]	_	100/11	
	_	- :	P.O. BOX	129, SWASTIKA, ONT	672	L RESOURCES,	100/11	Ξ
	_	- :	P.O. BOX	Porcier. Tel. (7	705) 567-3372]	-	100/11 -	-
	-	- ;	P.O. BOX [Lucien J.] jp 817 -	Porcier. Tel. (7	672 672	<u>-</u>	100/11	=
		- ;	P.O. BOX [Lucien J. jP 817 S - 817 AIDIE CREEK G	Porcier. Tel. (7	672 672 672 LEHART, ONTARIO,	<u>-</u>	100/11	-
	-	- ;	P.O. BOX [Lucien J. jP 817 S - 817 AIDIE CREEK G	Porcier. Tel. (7 [PP3-100%] ARDENS, RR#3, ENGI	672 672 672 LEHART, ONTARIO,	<u>-</u>	100/11	-
3978 (Fpb)	-	- ; 14(P	P.O. BOX [Lucien J. jP 817 817 817 AIDIE CREEK G. [Charles	PORCIER. Tel. (70 [PP3-100%] ARDENS, RR#3, ENGI	672 672 672 672 LEHART, ONTARIO,	<u>-</u>	100/11	100/52 100/52
722 (Gfb) 3978 (Fpb) 4375 (Fpb)	-	- ; 14(P	P.O. BOX [Lucien J. P.O. BOX A17 B17 AIDIE CREEK GA [Charles	PORCIER. Tel. (70 [PP3-100%] ARDENS, RR#3, ENGI	672 672 LEHART, ONTARIO,	<u>-</u>	100/11	100/52 100/52 100/52

Table 4. Container production nurseries by region (cont'd).

Green	nhouse capacity and style	(m ²)			production vities sown)		g production opable seedlings)		op dule
Heated houses	Unheated houses	Shelter- houses		Heated houses	Unheated houses	Heated houses	Unheated houses	Current	Over- wintered
		15(P) BIRC	HILL NURSERI	ES INC., RR#2, CO	OCHRANE, ONTARIO	, POL 1CO		
				[J. Russell	Skidmore. Tel.	[705] 272-6185]			
					[PP4-100%]				
2890 (Fpb)	_	_	jР	_					
(.F.)			bS	2419	-	2100	-	=	100/52
				2419	-	2100	-		
		16(1	P) BLAZ	ZECKA'S GREE	NHOUSE, RR#2, COC	HRANE, ONTARIO,	POL 1C0		
				[John Bla	zecka. Tel. (705) 272-3915]			
					[PP4-100%]				
1490, (Fpb)	-	-	jP bs	242 1008	-	174 963	-	-	100/52 100/52
				1250	-	1137	_		100/32
		17	7(P) EN	ERGREEN ENT	ERPRISES INC., P.	O. BOX 329. SWA	STIKA.		
					ONTARIO, POK 1T				
				[Gilbert Le	evangie. Tel. (7	05) 642-3426]			
					[PP4-100%]				
715 (Gpd)	-	-	jР	6284	1	5418	, g + -	50/14	50/52
			bS	2395	-	2127		64/18	36/52
				8679	-	7545	-		

Table 4. Container production nurseries by region (cont'd).

Greenh	nouse capacity and style	(m ²)		Control of the contro	production vities sown)		g production pable seedlings)		op edule
Heated houses	Unheated houses	Shelter- houses		Heated houses	Unheated houses	Heated houses	Unheated houses	Current crop	Over- wintered
			18 (GARDENS LTD., RRI		,		
				[Richard I	afleur. Tel. (70	05) 268-2323]			
					[PP4-100%]				
3921 (Gpb/g)	-	-	jP bS	4811 3434	Ξ	3848 2805	-	43/14 60/20	57/52 40/52
				8245	-	6653	-		
				P.O. BOX 1	TE, LOT 26, CONCE 868, HEARST, ONTA le Lamy. Tel. (7	RIO, POL 1NO	D ROAD,		
1248 (Gpg)	_	_		P.O. BOX 1	868, HEARST, ONTA	RIO, POL 1NO	D ROAD,	_	100/52
1248 (Gpg)	-	_		P.O. BOX 1	868, HEARST, ONTA	ARIO, POL 1NO	D ROAD,	- 62/20	100/52 38/52
1248 (Gpg)	-	_	jР	P.O. BOX 1 [Ms. Michel	868, HEARST, ONTA	ARIO, POL 1NO (05) 362-7040]	D ROAD,	- 62/20	
1248 (Gpg)	-	-	jP bs	P.O. BOX 1 [Ms. Michel 485 2093	868, HEARST, ONTA le Lamy. Tel. (7 [PP4-100%]	ARIO, POL 1NO (05) 362-7040] 465 1487 1952 BOX 10, RAMORE	<u>-</u>	- 62/20	
1248 (Gpg)	-	-	jP bs	485 2093 2578 (P) LAVA MO	868, HEARST, ONTA le Lamy. Tel. (7 [PP4-100%] UNTAIN LTD., P.O.	ARIO, POL 1NO (705) 362-7040] 465 1487 1952 BOX 10, RAMORE 0	<u>-</u>	- 62/20	
1248 (Gpg)	-	-	jP bs	485 2093 2578 (P) LAVA MO	868, HEARST, ONTA le Lamy. Tel. (7 [PP4-100%]	ARIO, POL 1NO (705) 362-7040] 465 1487 1952 BOX 10, RAMORE 0	<u>-</u>	- 62/20	
1248 (Gpg) 2984 (Gge/g)	-	-	jP bs	485 2093 2578 (P) LAVA MO	868, HEARST, ONTA le Lamy. Tel. (7 [PP4-100%]	ARIO, POL 1NO (705) 362-7040] 465 1487 1952 BOX 10, RAMORE 0	<u>-</u>	- 62/20	

Table 4. Container production nurseries by region (cont'd).

Gree	nhouse capacity and style	/ (m ²)			production vities sown)		g production pable seedlings)		cop edule
Heated houses	Unheated houses	Shelter- houses		Heated houses	Unheated houses	Heated houses	Unheated houses	Current crop	Over- wintered
			21		RESOURCES, 624 CHAMINS, ONTARIO, PA		н,		
				[Mark 1	Kean. Tel. (705)	264-2048]			
					[PP3-83%; PP4-17	7%]			
302 (Ffb)	-	_	jР	1467		888		83/12	17/52
1115 (Gpg)			bS	- -	-	1.070	·-		1120
				1467	_	888	_	-	-
			22-23		FORESTRY SERVICE, TIMMINS, ONTARIO,		AD,		
				[David Mi	llson. Tel. (705	5) 264-3426]			
					[PP4-100%]				
22(P) <u>Val</u> G	agne site								
1605 (Ffh)	-	_	jР	852	_	718	_	33/15	67/52
-1			bS	1420	-	1220	_	60/21	40/52
				2272	-	1938	-		
23(P) <u>Timmi</u>	ns site								
302 (Ffb)	-	-	jP bS	256	menth districts to and	251	-	100/15	-
				256	-	251	-		

Table 4. Container production nurseries by region (cont'd).

Green	nhouse capacity and style	(m ²)		dling production 00 cavities sown)		g production pable seedlings)		op dule
Heated houses	Unheated houses	Shelter- houses	Heat hous		Heated houses	Unheated houses	Current crop	Over- wintered
			24(P) NORT	HERN GREENHOUSE FARMS		160,		
			[R	.J. Deluce. Tel. (70	05) 264-9521]			
				[PP4-100%]	1			
2657 (Gph)	-	-	јР 1610	-	700	-	- 78/21	100/52 22/52
			bS 2869	_	2617		78/21	22/32
			4479	-	3317	-		
		25	(a) Modul (d)	RO DEVELOPMENT LTD.,	75 COVERNMENT ROA	D WEST.		
		23		KIRKLAND LAKE, ONTARI				
			[Ab	e Aidelbaum. Tel. (7	705) 567-5646]			
				[PP4-100%]	1			
2890 (Fpb)		_	jP -	7-2	_	-	-	-
			bs 1856	-	1669		-	100/54 100/54
			wS 580	-	376	-	-	100/54
			2436	(=)	2045	-		
								(cont'd)

Table 4. Container production nurseries by region (cont'd).

Gree	enhouse capacity and style	(m ²)	Seedling production ('000 cavities sown)				g production pable seedlings)	Crop schedule	
Heated houses	Unheated houses	Shelter- houses		Heated houses	Unheated houses	Heated houses	Unheated houses	Current crop	Over- wintere
NORTHEASTER	RN REGION								
		25(2)							
		26(C)			O, THESSALON, ONT		L RESOURCES,		
				[Glenn Oc	onnell. Tel. (705) 842-3914]			
					[PP4-91%; LT-9%]				
1491 (Fpe/f) -	-	jР	4289	4 (2007)	3167	-	70/14	30/48
			rP	594		462	<u>=</u>	-	100/49
			WP	180	-	144	-	-	100/49
			bS	287		272	-	-	100/48
			OC	12	TO tach do Tabella	6	0.00		
				5362	-	4051	-		
			27((P) AQUANOR	TH INC., P.O. BOX	390, NORTH BAY	4		
					ONTARIO, P1B 8H				
				[Gerry I	iddle. Tel. (705	472-4709]			
					[PP4-100%]				
1908 (Gpf)	_	-	jР	1988		1833	_	67/14	33/48
			rP	550	-	528	-	_	100/48
			wP	466	-	433	_	35/14	65/48
			bS	-	-	-	-		
				3004	-	2794	-		

Table 4. Container production nurseries by region (cont'd).

Green	house capacity and style	(m ²)			production vities sown)		ng production ppable seedlings)	Crop schedule		
Heated houses	Unheated houses	Shelter- houses		Heated houses	Unheated houses	Heated houses	Unheated houses	Current crop	Over- wintere	
				28(P) [BOI	DUC NURSERY] RR#1					
				[Amy-Jear	Bolduc. Tel. (7	05) 785-3788]				
					[PP4-100%]					
536 (Fpb)	_	-	jP bS	696	-	690	-	35/10	65/48	
				696	-	690	-			
36 (Fpa)	-	-	jP bS	680	=	673	-	35/14	65/48	
536 (Fpa)	_	_	jР	680	=	673	_	35/14	65/48	
				680	(-	673				
EASTERN REGI	CON	20(0) 0 4	IOW ADD. I	REDCUSON FO	OREST STATION, ONT	PARIO MINISTRY (of natural.			
		30(0) 0. 11			, KEMPTVILLE, ONT					
			i	[A.J. Campb	pell. Tel. (613)	258-3413]				
					[MP1-100%]					
900 (Fpa)	300 (Ff)	1200	jP wP bS	40 12 45	400	32 12 34	350 -	100/16 3/20 100/20	97/48	
			wS	22	-	22	-	100/20	_	
			OC	6 40	-	6 39	-	100/10		
				165	400	145	350			

Table 4. Container production nurseries by region (concl.).

Gre	enhouse capacity and style	(m ²)		lling production 00 cavities sown)		ng production ppable seedlings)	Crop schedule	
Heated houses	Unheated houses	Shelter- houses	Heat		Heated houses	Unheated houses	Current	Over- wintered
EASTERN RE	GION							
		31	(P) WALSH NUR	ERIES LTD., KEMPTVIL	LE, ONTARIO, KOG	1Ј0		
			(Irv	n Walsh. Tel. (613)	258-30531			
			•		200 30331			
				[MP1-100%]				
740 (Fpe/f) 280 (Fp)	_	jP -	_				
	, === (=p)		wP 300	-	284	_	100/18	-
			bs -	_	_	_	-	
			L 200	11.02-11.00	198	-	100/16	=
			500	518162 1 3H <u>-</u>	482	-		
CENTRAL REC	GION							
	32	(C) ORONO PRO RESOURCE	OVINCIAL FORES	T STATION, ONTARIO MI 119, ORONO, ONTARIO,	NISTRY OF NATURAL	L		
				d. Tel. (416) 983-91				
			I	MP1-100%]				
663 (Ffg/F	'pc) -	4830	jP -	-	()	-	-	-
663 (Ffg/F	'pc) -	4830	sP 55	.	50	-	-	100/-
663 (Ffg/F	'pc) -	4830	sP 55 bs -	1	_	-		100/-
663 (Ffg/F	'pc) –	4830	sP 55			-	-	

Table 5. Summary of planting stock production, all sources, for calendar year 1984 by region and type ('000 shippable seedlings).

	Conta	inerized	Bare	-root	Accel.	transplants	Cu	Total	
Region	Number	% of total	Number	% of total	Number	% of total	Number	% of total	production
Northwestern	12 376	71.3	3 739	21.5	1 241	7.2	-	-	17 356
North Central	24 173	81.3	5 569	18.7		-	-	-	29 742
Northern	35 662	63.0	18 980 ^a	33.5	1 949	3.4	57	0.1	56 648
Northeastern	8 208	84.8	1 471	15.2	-	-	-	-	9 679
Eastern	977	9.6	7 752	76.3	27	0.3	1 399	13.8	10 155
Central	62	0.5	12 915 ^b	98.4	65	0.5	79	0.6	13 121
Southwestern	-	:-:	6 059	100.0	-	-	~	-	6 059
	04.450	57.1	EC 405	20 F	3 202	2.3	1 535	1.1	142 760
	81 458	57.1	56 485	39.5	3 282	2.3	1 335	1.1	142 76

^aIncludes Swastika, Chapleau and Gogama nurseries (OMNR)

bIncludes Orono and Midhurst nurseries (OMNR)

22

Table 6. Summary of planting stock production for calendar year 1984 by region, type and source ('000 shippable seedlings).

	Containerized		Bare	Bare-root		ransplants	Cuttings			
Region	OMNR	Private	OMNR	Private	OMNR	Private	OMNR	Private	Total production	
		J. 1				7			17 47	
Northwestern	2 998	9 378	3 739	-	1 241		-	-	17 356	
North Central	2 800	21 373	5 569	-	-	-	-	-	29 742	
Northern	672	34 990	18 980 ^a	-	1 949	-	57	-	56 648	
Northeastern	4 051	4 157	1 471	-	-	-	-	=	9 679	
Eastern	495	482	7 752	-	27	_	1 399	_	10 155	
Central	62	7 % 2 - 2	12 915 ^b	-	65	_	79	-	13 121	
Southwestern	-	-	6 059	-	-	-	-	-	6 059	
	11 078	70 380	56 485	-	3 282		1 535	-	142 760	

aIncludes Swastika, Chapleau and Gogama nurseries (OMNR)

bIncludes Orono and Midhurst nurseries (OMNR)

- 23

Table 7. Summary of planting stock production, all sources, for calendar year 1984 by region, type and species ('000 shippable seedlings).

					Spe	ecies				
Region	Stock type	White spruce	Black spruce	Jack pine	Red pine	White pine	Larch	Other conifers	Hard- woods	Total productio
Northwestern	Containerized	_	3 399	8 977		-	-	-	-	12 376
NOTCHWOOCCEN	Bare-root	2 190	1 308	151	90	-	-	-	_	3 739
	Accel. transplants	107	824	-	310	-	-	_	-	1 241
	Cuttings	-	-	_	-	-	-	-	-	-
North Central	Containerized	-	13 485	10 688	-	_	_	-	_	24 173
	Bare-root	1 875	1 841	1 523	318	-	-	9	3	5 569
	Accel. transplants	-	100	-	-	-	-		-	-
	Cuttings	-	-	8. 8	-	-	-	-	=	-
Northern	Containerized	505	21 315	13 842	-	-	-	-	-	35 662
	Bare-root	4 387	6 001	8 592	-	-	-	-	-	18 980
	Accel. transplants	_	1 949	_	-	_	-	-	-	1 949
	Cuttings	-	57	-	-	-	-	-	-	57
Northeastern	Containerized	-	272	6 363	990	577	-	6	-	8 208
	Bare-root	-	-	1 029	428	14	-	-	-	1 471
	Accel. transplants	-	-	-	1	-	-	-	-	_
	Cuttings	11-11	-	-	-	-	-	-	-	-
Eastern	Containerized	22	34	32	S.—S	646	204	39	-	977
	Bare-root	461	-	1 153	187	4 453	149	926	423	7 752
	Accel. transplants	-	-	_	-	-	-	27	_	27
	Cuttings	-	-	-	-	-	-	-	1 399	1 399
Central	Containerized	s=	-	_	-	-	12	50	_	62
	Bare-root	2 877	14	153	4 442	2 418	4	2 419	588	12 915
	Accel. transplants	65	-	-	-	-	-	-	-	65
	Cuttings	18	51	-	-	-	10	-	-	79
Southwestern	Containerized	-	-	_	_	_	_	-	-	_
	Bare-root	426	-	-	139	2 591	38	1 896	969	6 059
	Accel. transplants	-	-	-	-	-	-	-	-	-
	Cuttings	-	-	-	-	-		-	-	-
		12 933	50 550	52 503	6 904	10 699	417	5 372	3 382	142 760