

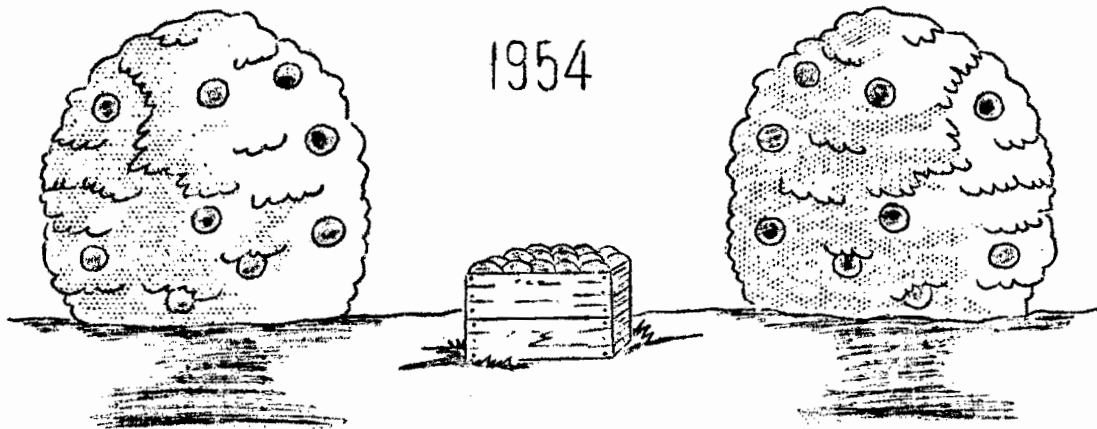
CS-SC-54-1

# CITRUS MANAGEMENT STUDY

NAVELS

LEMONS

VALENCIAS



University of California  
Agricultural Extension Service  
Los Angeles County

UC COOPERATIVE EXTENSION

## INTRODUCTION

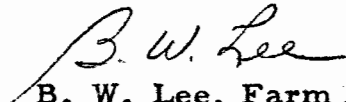
### TWENTY-FOUR YEARS OF CITRUS PRODUCTION COST STUDIES IN LOS ANGELES COUNTY

This is the twenty-fourth annual summary of the Los Angeles County Citrus Cost of Production Study. It is conducted by the Agricultural Extension Service of the College of Agriculture, University of California, in cooperation with local growers in the county and the Citrus League.

The purpose of the study is to make available current information on production costs and other business problems of the citrus growers and the citrus industry. The data presented in the tables was compiled from records furnished by the individual growers cooperating in the study. Since the number of records included is but a small sample of the local industry, the averages are not presented as average or typical for the county. You will notice in the study that there are some very high-producing orchards as well as orchards which have low yields. The costs of production of these orchards vary considerably, but the average will be a fairly good indication of what growers spend in this county to produce citrus.

It is imperative during these years of high production costs and smaller yields that each grower endeavor to put his orchard on as sound a financial basis as possible. Elimination of unnecessary costs, reducing certain cultural costs without materially affecting yields, and cutting down on cash overhead will increase the net income. Every tree space should contain a high or potentially high producing tree. Make an orchard analysis of your orchard to ascertain its productive potential.

We wish to express our sincere appreciation to the citrus growers of Los Angeles County who have cooperated in this study; also to Mr. George S. B. Ferguson of the Citrus League for his excellent work in collecting data; and to Mrs. Mary Combs, statistician in the Los Angeles Office of the Agricultural Extension Service, who is responsible for the compilation of most of the figures in this report.

  
B. W. Lee, Farm Advisor

## A GOOD ORCHARD MANAGEMENT PROGRAM

Irrigation is the most important and most neglected practice. Irrigate when needed but do not over irrigate. Large trees in interior valleys may use up to six inches of water per month in June and July. Study the soil - observe depletion - watch penetration - know your trees - beware of dry soil in early winter.

Fertilization must be adequate for heavy yields. Use 250 to 300 pounds of nitrogen per acre plus manures occasionally to maintain good water penetration. Use zinc each year. Apply other fertilizer nutrients if definitely needed; not otherwise.

Pest and Disease Control can not be neglected or delayed. Spray on time with efficient materials and equipment. Consult your Agricultural Inspector.

Non-Tillage although more expensive the first two years has definite advantages over tilled orchard. Water penetration is often improved. Gopher control is made easier. Roots are not damaged as with the discing operation.

Frost Protection will pay only when valuable crops are involved. Be sure to have a heater permit and strive to add just enough heat to barely save the crop. Firing too early and shutting off too late are expensive. Keep heaters clean and well adjusted.

Weed Control is necessary if under tillage system. Winter cover crops supply organic matter for soil tilth. Disc three times a year and then very shallow.

Pruning of oranges is not necessary other than removal of dead wood. Large trees should not be allowed to crowd. Lemons yield best when given light, frequent pruning to force a constant renewal of fruiting growth.

Replants are important because they maintain an orchard. Give special care to the little trees - it pays.

## EXPLANATION OF TERMS

Yields (a) Fieldbox yields are on the basis of actual field boxes, not standard field boxes,

(b) Packed box yields are for total fruit delivered to the packing house. This includes loose fruit, products, culls, rots, and packed fruit.

Cultural cost includes all labor and material costs involved in the production of the crop, except harvesting.

Harvesting cost is the cost of picking the fruit and hauling it to the packing house.

Cash overhead cost includes all cash costs other than labor and materials, such as taxes, insurance, repairs, general repairs, and services.

Depreciation is that share of the original cost of facilities which should be charged each year of use. It does not include trees.

Interest on investment is computed at 5 percent of the average value of farm buildings and equipment over their useful life.

Total income is computed for fruit delivered at the packing house door, where production stops and marketing begins.

Management income is total income less total cost of production. It is the amount available to reimburse the operator for his management after all costs are met.

Capital and management income is management income plus interest on investment. It is total income less total cash and depreciation costs. It is the amount available to reimburse owners and operators for capital used and managerial ability.

## INDIVIDUAL ORCHARD RECORD SUMMARY

Showing the main profit determining factors for each orchard; records arranged in decending order of capital and management income.

PER ACRE

Serial Number	Yield in Boxes		Ave. Price Packed Box	Total Income	Cultural Costs	Cash Overhead	Depreciation	Harvest Costs	Total Costs (Exc. Int.)	Capital and Management Income
	Field	Packed								
532	902	596	\$3.11	\$1853.54	\$321.90	\$ 65.94	\$32.36	\$397.47	\$817.67	\$1035.87
541	458	365	3.05	1112.45	250.74	71.94	34.57	196.85	554.10	558.35
74	712	470	2.88	1351.34	453.94	82.48	20.00	356.69	913.11	438.23
78	634	418	2.72	1137.64	320.70	101.01	3.97	319.33	745.01	392.63
548	644	418	3.13	1309.66	433.43	82.48	70.32	370.48	956.71	352.95
79	531	351	2.89	1014.33	298.13	102.26	17.13	251.61	669.13	345.20
99	716	433	2.36	1020.82	212.23	83.80	18.29	373.87	688.19	332.63
77	531	350	2.43	850.49	232.48	63.17	3.21	277.47	576.33	274.16
100	508	335	2.72	912.83	265.94	77.54	38.52	260.50	642.50	270.33
84	371	245	2.59	633.86	225.60	62.85	4.20	184.37	477.02	156.84
89	299	194	2.83	549.31	183.66	46.79	4.89	178.71	414.05	135.26
91	446	290	2.62	761.24	298.63	101.05	6.03	224.02	629.73	131.51
120	413	277	2.87	794.30	386.79	94.49	8.24	210.76	700.28	94.02
549	301	199	2.56	507.27	225.60	62.85	4.13	149.74	442.32	64.95
86	431	284	1.70	483.32	213.79	97.12	10.73	140.47	462.11	21.21
76	382	248	2.50	620.91	326.76	87.25	8.27	201.36	623.64	-2.73
75	496	328	2.39	782.31	342.11	152.82	46.82	259.56	801.31	-19.00
80	148	96	2.92	281.86	326.76	87.25	4.11	81.77	499.89	-218.03
1954 Ave.	530	352	2.81	987.60	317.73	82.88	22.75	267.82	691.18	296.42
Your Ave.										
1950-54 Av.	442	292	3.28	953.97	286.78	69.12	19.55	219.36	594.81	359.16
24-Yr. Ave.	429	264	2.44	627.58	209.40	49.97	19.63	142.12	421.12	206.46

LOS ANGELES COUNTY  
SITUATION 1954

LEMONS

Bearing Acreage-----	8,770*
Production (79# Boxes)-----	2,340,000*
Value (F. O. B.)-----	\$ 9,200,000*

Yields (Average)

Field Boxes - yield per acre-----	530
- price-----	\$1.86
Packed Boxes - yield per acre-----	352
- price-----	\$2.81
Total Average Income Per Acre-----	\$987.60

\* Data from Agricultural Commissioner's Report - 1954

Showing the main profit determining factors for each orchard; records arranged in decending order of capital and management income.

PER ACRE

Serial Number	Yield in Boxes		Ave. Price Packed Box	Total Income	Cultural Costs	Cash Overhead	Deprecia-tion	Harvest Costs	Total Costs (Exc. Int.)	Capital and Management Income
	Field	Packed								
546	695	534	\$2.70	\$1440.78	\$218.96	\$ 65.36	\$11.18	\$184.04	\$479.54	\$961.24
3	676	483	2.79	1348.64	195.24	64.06	9.00	180.07	448.37	900.27
16	423	309	2.88	890.91	218.50	102.80	5.91	101.78	428.99	461.92
541	393	286	2.66	758.38	214.46	77.04	12.51	98.70	402.71	355.67
26	291	221	3.06	676.96	142.25	75.60	29.27	83.78	330.90	346.06
20	352	246	3.26	802.85	237.68	91.12	64.27	90.30	483.37	319.48
9	500	356	2.10	747.15	236.00	66.80	7.96	126.30	437.06	310.09
2	520	357	2.39	853.49	307.91	86.30	12.19	144.97	551.37	302.12
28	352	230	3.09	710.19	319.43	48.41	23.41	89.58	480.83	229.36
14	362	255	2.76	702.61	307.41	86.28	8.27	99.61	501.57	201.04
547	220	160	3.18	510.07	233.76	59.47	2.87	57.27	353.37	156.70
8	420	296	2.57	762.95	380.88	84.77	33.50	114.59	613.74	149.21
10	292	156	2.33	364.15	65.68	68.31	26.93	76.35	237.27	126.88
5	249	169	2.62	442.89	189.87	60.62	6.88	69.13	326.50	116.39
27	263	181	2.75	498.06	213.79	97.12	10.73	73.49	395.13	102.93
11	278	196	2.19	429.56	172.24	59.40	13.10	82.60	327.34	102.22
545	316	231	2.02	466.88	216.90	59.73	25.97	67.82	370.42	96.46
125	380	274	2.27	621.96	386.79	94.49	8.24	95.94	585.46	36.50
1	364	256	2.03	519.00	314.45	100.69	1.87	92.00	509.01	9.99
4	172	121	2.23	269.52	183.66	46.79	4.89	44.32	279.66	-10.14
21	224	154	2.33	359.70	237.68	91.12	28.13	57.87	414.80	-55.10
25	319	228	1.81	412.14	298.63	101.05	2.34	80.59	482.61	-70.47
1954 Ave.	337	240	2.62	627.11	240.49	80.42	20.49	88.15	429.55	197.56
Ycur Ave.										
1950-54 Av.	412	291	2.33	673.81	260.19	67.59	21.71	98.65	448.14	225.67
24-Yr. Ave.	427	294	1.73	509.84	191.54	46.94	21.01	65.17	324.66	185.18

LOS ANGELES COUNTY  
SITUATION 1954

NAVELS

Bearing Acreage	-----	8,150*
Production (77# Boxes)	-----	1,360,000*
Value (F. O. B.)	-----	\$ 4,710,000*

Yields (Average)

Field Boxes - yield per acre	-----	337
- price	-----	\$1.86
Packed Boxes - yield per acre	-----	240
- price	-----	\$2.62
Total Average Income Per Acre	-----	\$627.11

\* Data from Agricultural Commissioner's Report - 1954



VALENCIAS - 1954

INDIVIDUAL ORCHARD RECORD SUMMARY

Showing the main profit determining factors for each orchard; records arranged in decending order of capital and management income.

PER ACRE

Serial Number	Yield in Boxes		Ave. Price Packed Box	Total Income	Cultural Costs	Cash Overhead	Deprecia-tion	Harvest Costs	Total Costs (Exc. Int.)	Capital and Management Income
	Field	Packed								
32	455	332	\$2.76	\$915.80	\$236.00	\$ 66.80	\$ 7.96	\$143.26	\$454.02	\$461.78
58	321	231	3.18	736.81	195.24	64.06	9.00	99.13	367.43	369.38
34	302	223	3.14	700.53	142.25	75.60	29.27	86.07	333.19	367.34
64	243	180	3.69	664.72	283.04	46.59	23.41	68.83	421.87	242.85
531	394	185	3.05	563.41	203.63	57.49	21.76	78.20	361.08	202.33
98	405	251	2.07	518.90	165.51	72.50	18.29	110.11	366.41	152.49
33	380	262	2.60	680.52	314.45	100.69	1.87	119.81	536.82	143.70
31	364	260	3.01	782.39	342.11	152.83	43.70	114.70	653.34	129.05
65	126	90	3.46	312.19	93.32	82.53	8.15	40.24	224.24	87.95
544	172	134	2.66	355.02	216.90	59.73	25.97	53.18	355.78	- .76
542	156	118	2.88	338.76	210.89	76.86	12.51	48.49	348.75	- 9.99
543	171	134	2.66	355.02	216.90	59.73	57.50	53.18	387.31	-32.29
67	149	88	2.20	194.82	125.83	77.21	13.36	57.00	273.40	-78.58
70	40	28	2.51	70.81	65.68	68.31	26.93	12.70	173.62	-102.81
39	105	70	2.67	188.22	189.87	60.62	6.88	33.83	291.20	-102.98
56	144	105	2.47	259.13	213.79	97.12	10.73	45.36	367.00	-107.87
46	100	69	3.74	258.87	237.68	91.12	64.28	33.41	426.49	-167.62
61	137	96	2.72	261.19	298.63	101.05	2.34	43.15	445.17	-183.98
52	151	102	3.37	342.64	380.88	84.77	33.50	50.21	549.36	-206.72
48	203	137	1.78	243.85	302.43	86.03	8.27	65.48	462.21	-218.36
43	78	52	2.20	114.26	237.68	91.12	28.13	27.06	383.99	-269.73
1954 Ave.	245	157	2.92	457.74	199.03	73.56	21.30	68.24	362.13	95.61
Your Ave.										
1950-54 Av.	353	246	1.88	436.04	196.24	58.97	15.56	96.93	367.70	68.34
24-Yr. Ave.	354	242	1.80	428.23	163.32	43.15	16.21	63.21	285.89	142.34

LOS ANGELES COUNTY  
SITUATION 1954

VALENCIAS

Bearing Acreage	-----	16,880*
Production (75# Boxes)	-----	1,500,000*
Value (F. O. B.)	-----	\$ 5,520,000*
Yields (Average)		
Field Boxes - yield per acre	-----	245
- price	-----	\$1.87
Packed Boxes - yield per acre	-----	157
- price	-----	\$2.92
Total Average Income Per Acre		\$457.74

\* Data from Agricultural Commissioner's Report - 1954

## 24 Years of Net Returns for Citrus in Los Angeles County

NET RETURN PER ACRE

