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Rural Tax Delinquency Study of the State of Oregon

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SUMMARY

1. General property is the principal source of revenue for the maintenance of local government in the State of Oregon. A high degree of real property tax delinquency, notably since 1930, has seriously threatened the financial solvency of many local governmental units, together with the institution of private property in land and buildings itself. Inevitable accompaniments have been the loss of homes, economic insecurity, and instability in land tenure.

2. The general property taxation laws of the state have undergone material revision during recent years, with the twofold purpose of easing the burden of the taxpayer and encouraging the payment of delinquent and current taxes. Delinquent taxes, under present laws, may be paid in small annual installments with accrued interest and penalties waived, provided current taxes are currently paid. The continued and accumulative effects of these laws should be highly constructive.

3. No significant correlation either positive or negative has been found to exist between size of farms and tax delinquency in any of the eight Oregon counties surveyed. In each of these counties, however, a farm size group was found with a shorter average period of tax delinquency than that of the farms in any other size group.

4. An analysis of outstanding taxes on the different types of land in the Willamette Valley counties disclosed the fact that the average period of delinquency was shorter on lands classified as adapted to intensive crops, general farming, and hay, grain, and seed production, than on lands classified as areas adapted to pasture, general farming, and extensive farming.

5. A comparison of the degree of tax delinquency in the different land-use areas in Morrow and Umatilla Counties disclosed the existence of heavy delinquencies in all areas in both counties. As between the different land-use areas in Morrow County the variation in the degree of tax delinquency was practically nil. In Umatilla County, however, there was evidence of relationship between land use and degree of tax delinquency.

6. Correlations of tax delinquencies with wheat yield, made for the principal wheat-producing counties of the state, Umatilla, Morrow, Gilliam, Wasco, and Sherman, excepting the results obtained from Umatilla County, indicated only the slightest trace of any relationship between the two magnitudes. In Umatilla County the average period of unpaid taxes on the poorer yielding land was appreciably longer than that on the better yielding land with the areas intermediate in yield occupying a corresponding position in the matter of tax delinquency.

7. The burdensomeness of the general property tax has been the basic cause of the heavy delinquencies during recent years and remains the primary cause of the problem arising in connection with the administration and collection of the tax.

Rural Tax Delinquency Study of the State of Oregon

By W. H. DREESEN, Agricultural Economist

I. INTRODUCTION

Importance of the general property tax. General property is the main source of revenue for the maintenance of local government in the State of Oregon with real property, exclusive of public utilities, representing over 70 per cent of all taxable values. Public utilities constitute approximately 18 per cent and taxable personalty about 10 per cent of the total.* Obviously it is of the highest importance that the administration and collection of the ad valorem tax on general property be both efficient and equitable.

A serious threat to the continued effectiveness of the general property tax, especially in its application to real property, is a high degree of delinquency, greatly aggravated during the years of the prolonged economic depression beginning in 1929.†

Tax delinquency is a threat to the financial solvency of local governmental units and to the very existence of the institution of private property in land and buildings. The inevitable accompaniments are loss of homes, economic insecurity, and instability in land tenure. Tax delinquency is the first step in the reverting of private lands into public ownership. A "new public domain" is in the building in the State of Oregon in common with that in many other states. The counties in Oregon at present are holding in excess of 1,780,000 acres of tax-reverted lands, an area about equal to 3 per cent of the total rural areas of the state, in addition to 154,000 city and suburban lots.‡ This new public domain, built up out of tax-reverted lands, is imposing upon our county officials most perplexing problems of management.§

The seriousness of a mounting tax delinquency, especially in the rural areas, led to a Federal nation-wide rural tax delinquency study in 1934, followed in various states, including Oregon, by state studies.

History of the rural tax delinquency studies in Oregon. During the early months of 1934, under a Civil Works Administration project, the Bureau of Agricultural Economics of the United States Department of Agriculture, in

*See "Fourteenth Biennial Report of the State Tax Commission" of Oregon, page 76. The above indicated percentages relative to taxable real property, public utilities, and personalty have not changed appreciably over a period of years.

†Rural real property includes tillable, nontillable, and timber land.

‡"Report of Interim Commission on State and Local Revenues" Submitted to the Governor of Oregon, January 1939. Page 24.

"Management of the Tax Reverted Lands in Oregon," Oregon State Planning Board, 1938.

The problem of tax reverted lands is a particularly vicious one for the reason that as more lands revert to public ownership the tax levies on the remaining private lands are increased to compensate for the loss in revenues. It is only as large areas become completely blocked up as public lands that any appreciable reduction in outlays for public services, such as roads, schools, and police protection, can be effected. The correctness of the above statement was amply verified in the public finance studies of the "Western Oregon Scattered Settlers" project and the "Central Oregon Grazing" project carried on under the supervision of the author by the Resettlement Administration.

§Although the segregation is incomplete, it is generally recognized that cut-over lands constitute a large per cent of tax reverted lands in many counties.

cooperation with the Agricultural Experiment Stations of the respective states, collected rural tax delinquency data for the years 1928 to 1933 inclusive, in the various states of the United States.*

In the State of Oregon such data were gathered in 15 of the state's 36 counties.† The data of 9 of the 15 counties were later sent to the Washington office for tabulation and analysis.‡

Following the completion of the survey of the 15 Oregon counties under the direction of the Bureau of Agricultural Economics, application for funds was made to the Civil Works Administration by the Oregon Agricultural Experiment Station to carry out a similar survey of the remaining 21 Oregon counties and for the making of rural tax delinquency maps for all Oregon counties. The necessary funds were forthwith granted and the gathering of the rural tax delinquency data was completed during the early months of 1935. The tax delinquency maps were not all finally completed until the early spring of 1936.§

Upon the completion of the maps from the assembled data, both data and maps were used for further study in the present Experiment Station project. Various analyses have been undertaken with a view to discovering any existing relationships between rural tax delinquency and such other factors as size of farms, assessed valuations, crop yield, soil type, and land use.‖

The existence of any such sequential relationships was sought with the further objective of discovering causes, other than the generally burdensome property taxes, that might be contributing in a substantial degree to the volume of rural tax delinquency.

II. OREGON LAWS RELATING TO TAX COLLECTIONS, DELINQUENCY, AND FORECLOSURE

Changes in taxation laws. The laws of the State of Oregon relating to the collection of the general property taxes, tax delinquency, and foreclosure are of uniform application throughout the state. The administration of these laws, although under the surveillance of the State Tax Commission, is left largely with the counties. This practice is consistent with decentralized administration in the states generally and affords a margin of freedom in the enforcement of the laws to meet varying local situations. General or state-wide changes in the economic or political conditions in the state, however, call for changes in the taxation laws themselves. Such changes, unquestionably, have measurable effects upon the promptness with which taxpayers meet their public obligations; in short, upon tax delinquency.

*Nation-wide Civil Works Administration project, F-6 (1934) under the supervision of Eric Englund, Assistant Chief of the Bureau of Agricultural Economics.

†Counties in which data were gathered: Benton, Clackamas, Columbia, Coos, Douglas, Grant, Hood River, Jackson, Josephine, Klamath, Linn, Sherman, Umatilla, Union, and Yamhill. Rural tax data were gathered in these counties under the supervision of Ralph E. Reynolds, assisted by the author.

‡Counties for which data were sent to the Washington office: Benton, Clackamas, Columbia, Coos, Douglas, Hood River, Sherman, Umatilla, and Union. For tabulations and analyses of these data, see appendix.

§The rural tax delinquency maps were all made to the scale of 1 inch to the mile and are on file at the Oregon State College where blue print copies may be obtained at cost of material and labor. This rural tax delinquency study commenced as a C. W. A. project, was continued as State Emergency Relief Administration Project S-F2-25, and finally completed as Works Progress Administration Project O.P. 65-94-118 under the supervision of the author.

‖On account of its voluminousness, the data of only a limited number of counties have been given further study in this project.

During recent years the Oregon laws relating to general property taxation have undergone many changes. Some of these changes have been of minor importance, such as the shifting of tax collection dates, whereas others, made in pursuance of major economic movements, have been of basic importance.

Under the laws of 1919 and those of prior years, the first half of all taxes levied upon general property was payable on or before the fifth day of April, next following the imposition of the levy, and the second half on or before the fifth day of October. All taxes not so paid were subject to an interest charge of 1 per cent per month. All taxes not paid by the fifth of November, next following the imposition of the levy, were subject to an additional penalty of 5 per cent.*

The law further provided that any day after the expiration of 6 months after the taxes charged against real property became delinquent, the county court was authorized to issue certificates of delinquency to private persons upon the payment of the delinquent taxes, penalty and interest.,† Any time after the expiration of 3 years from the first date of delinquency the holder of the certificate could apply to the circuit court for a decree foreclosing any lien against the property mentioned on such certificate.‡

The 1923 legislature reduced the penalty on delinquent taxes from 5 per cent to 3 per cent§ and the following legislature reduced the interest charge on delinquent taxes from 1 per cent to five-sixths of 1 per cent per month. The dates for the payment of taxes were also changed from April 5 and October 5 to May 5 and November 5, respectively. The 3 per cent penalty on delinquent taxes was made to apply after the fifth of December.‖

The 1927 legislature restored the 1 per cent per month interest charge on delinquent taxes, but reduced the penalty from 3 to 2 per cent, making it apply to all taxes unpaid on the fifth day of February.¶ All real property three or more years tax delinquent remained subject to foreclosure proceedings.

Four years later, 1931, the State Legislature unquestionably reacted to the effects of the general economic depression that by this time were making themselves keenly felt. The interest charges on delinquent taxes, including those for the year 1928 and thereafter, were reduced from 1 per cent a month to two-thirds of 1 per cent per month, or from an annual rate of 12 to 8 per cent. The additional penalty levied under previous laws was removed in its entirety.** These changes in the law lightened the excessive burden on those unable to meet their tax payments when due, but they undoubtedly invited postponement in tax payments on the part of many who would have met their public obligations punctually under the old law.

As a result of the increasing seriousness of the delinquent tax situation, the state legislature, in its 1933 session, sought to provide incentives for the payment of back taxes. A law passed at that session provided in substance for the waiving of all penalties and interest charged and accrued on delinquent taxes on the rolls of the several counties for the year 1930 and all prior rolls, provided that all such delinquent taxes be paid in ten equal semiannual installments. Failure to pay any installment of such delinquent taxes when due, subjected the tax-

*Session Laws of 1919, p. 230.

†Immediately after taxes upon personal property become delinquent the tax collector is legally bound to advertise and sell such a quantity of the property as will yield the unpaid taxes and accrued interest and penalty. Personal property taxes may also become a lien upon the taxpayer's real property, taxable in the state.

‡Session Laws of 1921, p. 358.

§Session L'aws of 1923, p. 374.

‖Session Laws of 1925, p. 66.

¶Session Laws of 1927, C. 327, p. 422.

**Session Laws of 1931, C. 224, p. 352.

payer to a 2 per cent penalty, and failure to pay three installments of such taxes when due restored all the accrued interest and penalties together with all the remedies of foreclosure.*

The effect of the above law upon the volume of tax delinquency in the state will always remain a matter of dispute. It is generally agreed that the law acted as an incentive to the payment of delinquent taxes appearing upon the 1930 and prior rolls, but since obtaining benefits under the law was not conditional upon the payment of current taxes, the law unquestionably had a dilatory effect upon the payment of the latter taxes.

Certificates of delinquency for taxes on the 1930 and prior rolls held otherwise than by the county, remained valid. Those held by the counties, however, were declared void. No certificates of delinquency other than to the counties themselves have been issued since the passage of this law.

In the regular session of the 1935 legislature a law was passed providing for the payment of all general property taxes in four equal installments, the first on or before the fifteenth of March, and the second, third, and fourth payments on or before the fifteenth of June, September, and December respectively. The law also provides for the allowance of discounts on partial or full payment of such taxes made on or before the fifteenth of March, as follows: "One per cent on one-half of such taxes so paid; 2 per cent on three-quarters of such taxes so paid; 3 per cent where all of such taxes are so paid." The discount allowed is equal to 8 per cent interest payable in advance by the county.†

The apparent major defects of the 1933 law were remedied in a new measure passed by the legislature convened in special session October 21, 1935. The waiving of accrued interest and penalties on delinquent taxes was extended to include those on the 1933 rolls, but participation in the more liberalized benefits under the new law was made conditional upon the payment of current taxes. The law requires that not less than one-quarter of the taxes of the earliest year of delinquency be paid annually in addition to the current taxes.‡ Whenever two installments of such outstanding taxes are not paid in accordance with the law and 5 years shall have elapsed from the earliest date of delinquency a certificate of delinquency shall be issued to the county§

The 1937 legislature extended the waivers of accrued interest and penalties on delinquent taxes to include those appearing upon the 1934 rolls.‖ Our most recent (1939) legislature made no significant changes in these phases of our general property taxation laws.

Effects of changes in laws. An attempt to measure the effects of the above noted changes in our property taxation laws upon the volume of tax delinquency in the state is a hazardous procedure because of the many other contributing factors. A study of Tables 1 and 2, however, indicates unmistakable evidence of the effects of the recent legislation bearing on the payment of delinquent taxes.

Total delinquent taxes reached an all-time high at the close of 1935 of $46,510,724.53. By December, 1937, they had fallen to $40,775,152.39, a reduction slightly in excess of 12 per cent. This decrease in total delinquency, however, could readily be accounted for by the general improvement in the economic situation during these years.

*Session Laws of 1933, Chapter 462.
†Session Laws of 1935, C. 336, Sec. 1.
‡Session Laws, Special Session, 1935, Chapter 5, Sections 2 and 3.
§Session Laws, Special Session, 1935, Chapter 5, Section 4.
‖Session Laws of 1937, Chapter 96.

More significant is the change in per cent of current taxes paid during recent years as compared with the per cent of current taxes paid during the earlier years of the depression. More than 43 per cent of the taxes on the rolls of 1932 became delinquent, whereas only 16.39 per cent of the taxes levied on the 1936 rolls became so delinquent. According to Table 2, the percentages of total levies becoming currently delinquent were as follows:

On the 1932 Rolls, 43.77 per cent
On the 1933 Rolls, 33.92 per cent
On the 1934 Rolls, 30.13 per cent
On the 1935 Rolls, 17.88 per cent
On the 1936 Rolls, 16.39 per cent

The effects of the recent legislation are apparent in these data. It is obvious that taxpayers are meeting their current taxes in order to obtain the benefits of interest and penalty waivers on taxes delinquent on prior rolls. Normally, back taxes are paid in full before the taxes on the current rolls are met.

This deduction does not necessarily imply that the recent tax legislation is responsible in any major way for the reduction in the total unpaid taxes in the state during the past few years. The deduction is that the new laws have encouraged the payment of current taxes together with the payment of at least a modicum of back taxes. The law's continued effectiveness in this manner over a period of years should yield salutary results.*

Table 1. Total Taxes Delinquent on the 1929 and all Prior Rolls, on the 1930 and all Prior Rolls, and Total Taxes Delinquent for all Years as of Dates Indicated in the Thirty-six Counties in Oregon.†

Taxes delinquent on rolls of 1929 and prior years	Taxes delinquent on rolls of 1930 and prior years	Total outstanding delinquent taxes as of dates indicated	As of date
$7,792,562.61	.....	$45,906,064.87	Nov. 1933
6,715,036.79	.....	46,172,566.80	Dec. 1934
	$9,679,434.77	46,510,724.53	Dec. 1935
	8,198,129.90	43,006,340.85	Dec. 1936
	7,206,408.56	40,775,152.39	Dec. 1937

†Source: "Statement of Property Tax Collections and Delinquencies Compiled by State Tax Commission from Reports of County Tax Collectors."

Table 2. Percentages of Total General Property Taxes Levied in the State of Oregon Delinquent on the Rolls of 1930 to 1936 Inclusive, as of the Dates Indicated, in the Thirty-Six Counties in Oregon.†

Tax roll years	Per cent of total tax levied delinquent as of dates indicated				
	Nov. 1933	Dec. 1934	Dec. 1935	Dec. 1936	Dec. 1937
	Per cent	*Per cent*	*Per cent*	*Per cent*	*Per cent*
1930	15.40	11.55	.....	.....	.....
1931	27.97	19.71	15.42	12.45	10.33
1932	43.77	26.82	20.41	16.77	14.06
1933	.....	33.92	23.61	18.91	15.98
1934	.....	.....	30.13	18.76	14.88
1935	.....	.....	.....	17.88	10.63
1936	.....	.....	.....	.....	16.39

†Source: "Statements of Property Tax Collections and Delinquencies Compiled by the State Tax Commission from Reports of County Tax Collectors."

*May not the cynic reason that the good results of the law will be offset by the taxpayers, not burdened with delinquent taxes, letting their current taxes become delinquent in the expectation that future legislation will extend the privilege of waiver of interest on these also?

III. TAX DELINQUENCY AND SIZE OF FARMS

Percentage distribution of "all" farms and of "all tax delinquent" farms of eight Oregon counties, on the basis of acreage per farm, is presented in Table 3. The counties included in this study are widely scattered throughout the state and represent various types of agricultural interests and activities.

The purpose of this survey was to discover any possible relationship between size of farms and tax delinquency existing on the rolls of 1928 to 1932 in the summer of 1934. Observation of the data in the table reveals the fact that in all of the counties under survey, with the exception of Harney County, a high degree of correlation existed between the distribution of "all" farms among the different farm size-groups and the distribution of "all tax delinquent" farms among the corresponding size-groups. This is equivalent to stating that, although the per cent of tax delinquency may be above or below the average in an occasional size-group, no general pronounced variation in delinquency in the different farm size-groups obtains. The absence of any appreciable variation in degree of delinquency in the different size-groups is especially noticeable in the cases of Benton and Linn Counties. The data from Harney County are extremely erratic. The data from all counties indicate a decided tendency for "tax delinquent" farms as well as for "all" farms to mass in two size-groups.

In each of five out of the eight counties, Benton, Curry, Hood River, Linn, and Washington, the highest per cent of "all" farms in any size-group was found in the 20- to 99-acre group and in each of the other three counties the highest per cent of "all" farms in any size-group was found in the 500-acre and above group. In each of seven of the counties under survey, the highest per cent of "all tax delinquent" farms in any size-groups was found in the 20- to 99-acre group. In the remaining county, Sherman, such highest per cent was found in the 500-acre and above group.

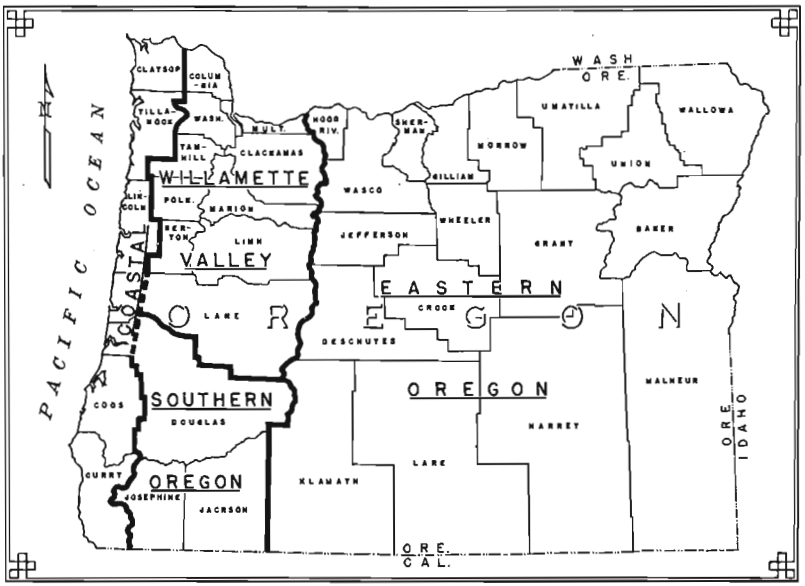


Table 3. Percentage distribution of "all" farms and of "all tax delinquent" farms on basis of acreage per farm of eight Oregon counties. Tax delinquency for years 1928 to 1932 as of summer of 1934.*

Size-group	Benton†		Curry		Harney†		Hood River†	
	Per cent of all farms	Per cent of all tax delinquent farms	Per cent of all farms	Per cent of all tax delinquent farms	Per cent of all farms	Per cent of all tax delinquent farms	Per cent of all farms	Per cent of all tax delinquent farms
10 to 19 acres	10	12	10	16	1	8	33	42
20 to 99 acres	36	40	23	39	5	29	58	44
100 to 174 acres	21	14	22	22	15	5	5	9
175 to 259 acres	12	16	13	4	5	20	2	1
260 to 499 acres	14	13	16	14	23	25	2	3
500 acres and above	7	5	16	5	51	13	0	1
	100	100	100	100	100	100	100	100

Size-group	Linn†		Sherman		Union		Washington	
	Per cent of all farms	Per cent of all tax delinquent farms	Per cent of all farms	Per cent of all tax delinquent farms	Per cent of all farms	Per cent of all tax delinquent farms	Per cent of all farms	Per cent of all tax delinquent farms
10 to 19 acres	7	13	0	2	10	17	20	24
20 to 99 acres	39	43	2	7	23	25	56	49
100 to 174 acres	24	16	3	10	14	19	16	25
175 to 259 acres	13	15	2	2	11	7	5	1
260 to 499 acres	12	10	10	28	18	17	2	1
500 acres and above	5	3	83	51	24	15	1	0
	100	100	100	100	100	100	100	100

*Farms of less than 10 acres are excluded from this analysis. Data on "all" farms are taken from the 1930 U. S. Census. Distribution percentages are given in round numbers only.
†All farms of 10 acres or more were used in the computation for these counties. In the remaining counties the farms of 10 acres or more of a limited number of townships, chosen at random, were used.

These data not only definitely fail to establish any significant correlation between size of farms and tax delinquency, but also preclude the assumption of the existence of any such general relationship.

The following observations, however, based on a further analysis of the data in the table are of interest, if not significant.

In each of the eight counties under survey, a farm size-group is found containing a substantial per cent of all the farms in the county, with a notably favorable tax delinquency record. The following data indicate the size-groups

County	Size-group with favorable tax delinquency record	Per cent of all farms in the size-group	Per cent of all delinquent farms in size-groups
Benton	100-174	21	14
Curry	500 and above	16	5
Harney	500 and above	51	13
Hood River	20-99	58	44
Linn	100-174	24	16
Sherman	500 and above	83	51
Union	500 and above	24	15
Washington	20-99	56	49

with the favorable tax delinquency records for the eight counties under survey, the percentages of "all" farms in these size-groups and the percentages of "all delinquent" farms in the corresponding size-groups.*

Although the above data do not irrefutably establish a connection between the size of farms and tax delinquency in the indicated size-groups for the different counties, they do build up a high presumption in that direction. The strongest evidence is found in the case of Harney County. Fifty-one per cent of "all farms" according to the 1930 U. S. Census were in the 500-acre and above size-group with only 13 per cent of "all tax delinquent" farms in this group. In the other counties the evidence, although not so convincing, points strongly in the direction of a relationship. From the standpoint of the more favorable rural tax delinquency records, the optimum size farms in Hood River and Washington Counties were found in the 20- to 99-acre size-groups, in Benton and Linn Counties in the 100- to 174-acre groups, and in Curry, Harney, Sherman, and Union Counties in the 500-acre and above size-groups.

The following further observations based on the data in Table 3† are significant. In Curry County, the two smallest farm size-groups, the 10- to 19-acre and the 20- to 99-acre groups, containing only 33 per cent of "all farms" of the county, represented 55 per cent of "all tax delinquent farms," and in Harney County the same two farm size-groups containing only 6 per cent of "all farms" of the county represented 37 per cent of "all tax delinquent farms."

No attempt is made in this study to explain why the farms with the more favorable or the less favorable tax delinquency records are found in certain size-groups.

Percentage distribution of tax delinquent farms of eight Oregon counties, arranged in accordance with the number of years delinquent, is presented in Table 4. The five-year delinquent taxes are on the 1928 rolls. The rapid rise in tax delinquency begins with the levies on the 1930 rolls payable in the year 1931.

Table 4. Percentage Distribution of Tax Delinquent Farms According to Number of Years Delinquent. Taxes Delinquent on Rolls of 1928 to 1932 inclusive, as of Summer of 1934 for Eight Oregon Counties.‡

County	Number of years tax delinquent					
	One year	Two years	Three years	Four years	Five years	All years
	Per cent	*Per cent*	*Per cent*	*Per cent*	*Per cent*	*Per cent*
Benton	39.99	26.80	18.21	6.99	8.01	100
Curry	29.89	23.73	28.04	11.25	7.09	100
Harney	30.06	34.76	14.73	10.41	10.04	100
Hood River	23.37	31.89	19.02	10.57	15.15	100
Linn	50.39	27.98	13.37	4.57	3.69	100
Sherman	11.76	18.72	35.83	21.93	11.76	100
Union	25.63	21.51	23.80	5.95	23.11	100
Washington	31.88	34.20	18.94	8.85	6.13	100

‡The percentages given in the table are based on actual count of all tax delinquent farms in the eight counties.

*In Hood River, Linn, and Washington Counties there were other size-groups with more favorable tax delinquency record than the size-groups recorded here, but the percentages of total farms in such groups were too small to be significant.

†If the data in Table 3 err in either direction it is in underestimating the tax delinquencies of the larger farms. The data on total number of farms are taken from the 1930 U. S. Census and the tax delinquency data were taken from the county tax rolls. According to the Census definition, a "farm may consist of a single tract of land or of a number of separate tracts . . ." In the gathering of the tax delinquency data it has not always been possible to bring together as one farm the various tracts that under the census definition would constitute a single farm. This error would of course result in increasing the number of tax-delinquent farms in the smaller size-groups and in decreasing the number of such farms in the larger size-groups.

The general economic depression that had its beginning in the latter part of the year 1929 was evidently finding expression in increasing delinquent taxes in 1931.

IV. TAX DELINQUENCY AND LAND TYPES

In March 1937, the Oregon Agricultural Experiment Station published the results of a land classification study entitled "Willamette Valley Land Adaptability."*

One of the purposes of this project as stated by the authors was " . . . to make a classification of the agricultural lands of the Willamette Valley into broad areas of fairly uniform adaptability for crop production."†

In the above project the land areas of the Willamette Valley, excluding " . . . about 20 per cent of the mapped soils that are located in shoestring valleys or heavily timbered sections" were classified into four types of valley lands and two types of hill lands, as follows:

"Land Classification, Willamette Valley:

Land type numbers	*Type of land*	*Area predominantly adapted for:*
1	Valley	Intensive crops, such as vegetables, small fruits, hops, etc.
2	Valley	General farming, with limited production of intensive crops.
3	Valley	Hay, grain, and seed production.
4	Valley	Pasture, with limited production of hay, grain, and seed.
1H	Hill	Fruit raising and general farming.
2H	Hill	Pasture and extensive cropping."

The above classification of Willamette Valley lands, due to its practical significance and the extensiveness of the areas included, offered material for the comparison of tax delinquency with types of land.

Table 5. Acreages of Willamette Valley Land Types by Counties.‡

County	Land types						
	Valley Type 1	Valley Type 2	Valley Type 3	Valley Type 4	Hill Type 1	Hill Type 2	All types
	Acres	*Acres*	*Acres*	*Acres*	*Acres*	*Acres*	*Acres*
Clackamas	6,000	55,440	97,080	.....	75,840	110,400	344,760
Lane	59,960	56,080	64,880	59,720	2,360	85,320	328,320
Linn	69,480	45,560	68,160	180,760	7,160	140,080	511,200
Polk	17,960	31,560	62,520	5,120	6,680	128,760	252,600
Washington	16,200	102,200	32,760	.....	89,240	34,520	274,920
Yamhill	10,520	50,200	60,240	.....	29,280	128,920	279,160
TOTAL	180,120	341,040	385,640	245,600	210,560	628,000	1,990,960

‡Some of these figures are slightly at variance with those found in the "Land Adaptability" bulletin. This is due to the fact that the boundaries between the types of land as appearing on the map could not always be read with sufficient accuracy. The greatest discrepancy appears in the case of Hill Type lands H1 and H2. It appears that about 24,000 acres of Hill Type land H2 got misplaced in Type H1 classification. This represents about 3.8 per cent of all H2 lands. The total acreage of all types of land as taken from the map for this study is 1,990,960 acres as compared with a total of 2,013,608 acres recorded in the bulletin, a discrepancy of 1.2 per cent.

*"Willamette Valley Land Adaptability," Station Circular 120, by H. E. Selby, Economist, and Leland Fryer, Research Assistant, Department of Farm Management, Oregon State College.

†". . . the land in the (Willamette) Valley consists of a mixture of some 34 soil series, each consisting of several soil types. For the entire Valley there are 157 named soil types and these soils vary widely in their adaptability for crop production."—"Willamette Valley Land Adaptability," p. 2.

The classified land areas of six counties, Clackamas, Lane, Linn, Polk, Washington, and Yamhill, were selected as a basis for the comparative tax delinquency study. The acreages included in the selected areas are set forth in Table 5, both by counties and land type areas.

The average number of years of tax delinquency appearing on the tax rolls 1928 to 1932 inclusive, as of the summer of 1934, were next calculated for each of the six land type areas in each of the counties selected. The results obtained appear in Table 6.

Table 6. Average Number of Years of Tax Delinquency of the Six Land Type Areas for Counties Indicated.

County	Land types						All types average (weighted)
	Valley Type 1	Valley Type 2	Valley Type 3	Valley Type 4	Hill Type 1	Hill Type 2	
	Acres	*Acres*	*Acres*	*Acres*	*Acres*	*Acres*	*Acres*
Clackamas	.49	.49	.48	.....	.88	.82	.68
Lane	.36	.41	.37	.48	.31	.54	.44
Linn	.79	.87	.86	.90	1.20	1.07	.93
Polk	.22	.36	.50	.49	.70	.64	.54
Washington	.48	.39	.48	.....	.69	.54	.52
Yamhill	.67	.68	.67	.....	.75	.84	.76
AVERAGE (weighted)	.548	.513	.561	.786	.780	.791	.675

The lowest average number of years of tax delinquency on all types of classified lands was found in Lane County, with Washington, Polk, Clackamas, Yamhill, and Linn Counties following in order of importance. The weighted average number of years of tax delinquency for all six types of land for all counties under survey was .675. This is equivalent to stating that slightly in excess of two-thirds of a full year's tax on all classified lands in the six counties was outstanding on the 1928 to 1932 tax rolls in the summer of 1934.

As between types of land the average period of tax delinquency on the Valley Types 1, 2, and 3 was with two minor exceptions shorter in all counties than the period of delinquency on Valley Type 4 and the two Hill Types in the corresponding counties.*

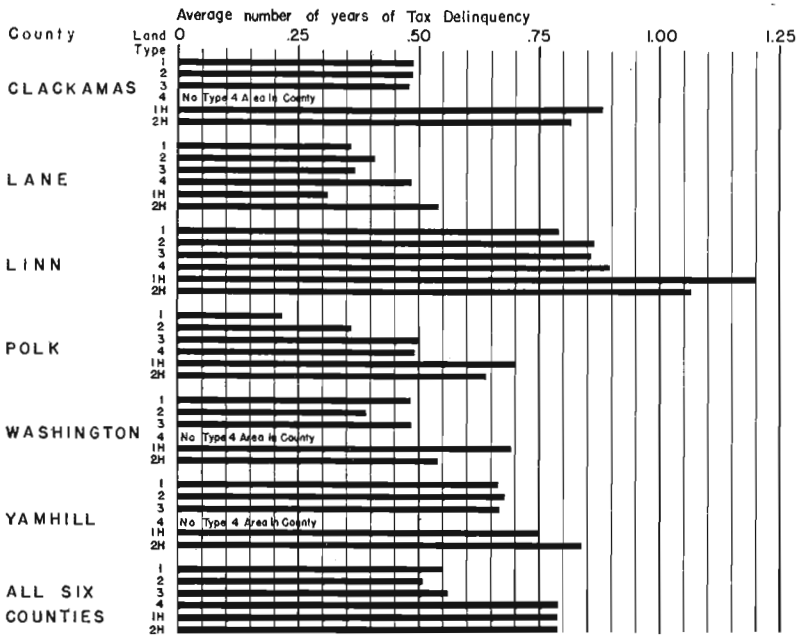
The average period of tax delinquency on the latter groups, Valley Type land 4 and Hill Type lands 1 and 2, was one-fourth of one year, or 46 per cent, in excess of the average period of tax delinquency on the former groups, Valley Type lands 1, 2, and 3.

Outside of alluding to the generally recognized fact that the lands of the Valley Types 1, 2, and 3, are superior in quality to and hence more productive than those of the other three types, no attempt is made in this study to suggest a possible cause for the marked difference in tax delinquency on these two groups of lands.

*In Lane County, Hill Type No. 1 has the lowest tax delinquency of all the six land types. In Polk County, Valley Type No. 4 is slightly lower than Valley Type No. 3.

The above data are graphically represented in the following bar diagram:

AVERAGE NUMBER OF YEARS OF TAX DELINQUENCY
FOR EACH OF THE SIX LAND TYPE AREAS BY COUNTIES
1928 TO 1932 TAX ROLLS AS OF 1934



V. TAX DELINQUENCY AND LAND USE IN UMATILLA AND MORROW COUNTIES*

For a study of the relation of tax delinquency to land use, Umatilla and Morrow Counties were selected. The land areas put to different uses in these counties are rather well delimited even though a minimum amount of interchange of use at the boundaries of such areas is inevitable.

The major uses of land in both counties are wheat raising, grazing, and timber growing. The grazing land in Umatilla County is divided into the sagebrush area of the northwestern part of the county and the better grazing land to the east and the south of the wheat land, which is located in the north central part of the county. The timber areas are found in the extreme eastern and southern parts of the county.

*The land-use maps used in this study were prepared by J. D. Belanger, County Agricultural Agent, and W. W. Gorton and C. D. Merryman, Oregon Agricultural Experiment Station.

The grazing lands in Morrow County are also divided into two sections with one area in the extreme northern part and the other area extending from the east central toward the southwestern part of the county. The wheat land lies to the north and west of this grazing region and the timber land lies to the south of it. A small amount of irrigated land is found scattered throughout the wheat-growing region.

The acreages of the different land-use areas covered in this study are as follows:

Umatilla County	*Acreage*
Wheat Land	415,000
Sage Brush Grazing Land	203,280
Bunch Grass Grazing Land	459,160
Timber	161,200
Total acreage	1,238,640

Morrow County	*Acreage*
Timber	104,160
Wheat	288,560
North Grazing Area	134,000
South Grazing Area	322,080
Total acreage	848,800

Preliminary to the calculation of the degree of tax delinquency prevailing in the different areas, all public lands, federal, state, and county, were eliminated. In Morrow County the irrigated lands scattered throughout the wheat-growing region were also excluded from the calculation as far as practicable. The results obtained in the survey on degree of existing tax delinquency in the two counties are as follows:

Land use area	No. of years tax delinquency on rolls of 1928 to 1932 as of the summer of 1934
Umatilla County	
Wheat Land	.97
Sage Brush Grazing Land	1.20
(Bunch Grass) Grazing Land	1.42
Timber	1.43
Weighted averages	1.23
Morrow County	
Timber	1.79
Wheat Land	1.86
North Grazing Area	1.87
South Grazing Area	1.96
Weighted averages	1.89

According to the above data Umatilla and Morrow Counties had one condition in common in the summer of 1934; namely, a heavy tax delinquency on the 1928 to 1932 rolls, Umatilla County with the equivalent of 1¾ years of unpaid taxes on the rolls and Morrow County with not far from 2 years of unpaid taxes on the rolls of the same years.

The variations in the degree of tax delinquency obtaining in the different land-use areas in Morrow County were found to be too slight to indicate any relationship between land use and unpaid taxes. The greatest variation in the

length of periods of tax delinquency of any two land-use areas in the county existed in the case of the timber lands with 1.79 years of unpaid taxes and the south grazing area with 1.96 years, a difference in length of periods of delinquency of only 9 per cent. The length of the periods of tax delinquency of the north grazing area and the wheat-producing area varied by only one-half of 1 per cent.

The data for Umatilla County indicate a probable relationship between tax delinquency and land use. In this county the period of delinquency on timber lands exceeded in length that on wheat lands by more than 47 per cent. The sage lands were carrying a delinquency almost 24 per cent in excess of that on wheat lands, whereas the period of tax delinquency on the better grazing lands was practically equal to that on the timber lands.

No attempt has been made in this study to discover a cause or causes for the prevailing variation in tax delinquency on the different land-use areas. The variations in degree of delinquency of the different areas in Umatilla County, however, were sufficiently marked to establish a presumption in favor of a relationship between such delinquency and land use.

VI. TAX DELINQUENCY AND WHEAT YIELD

The wheat-producing areas of the state offered the best opportunity for discovering any existing relationship between crop yield and degree of tax delinquency. As a part of this study the wheat yield of the five major wheat-producing counties, Umatilla, Morrow, Gilliam, Wasco, and Sherman, was correlated with the degree of tax delinquency in the corresponding areas. Correlations between wheat yield and tax delinquency were calculated for both the individual townships and for each of the wheat-producing areas of the five counties as units. The areas included in the study aggregate 106 townships containing in excess of 2,440,000 acres.*

In correlating the data for the individual townships a positive coefficient of correlation was discovered in the case of 44 townships and a negative coefficient in the case of 62 townships.† Stated in nontechnical terms these results would indicate a tendency for tax delinquency to rise with an increase in wheat yield in the 44 townships and for tax delinquency to fall with an increase in the wheat yield in the 62 townships.‡

Due to the small number of cases compared in the individual townships (a maximum of 36 sections to the township) the results obtained, either positive or negative, are not convincing. The probability of mere chance relationship,

*In correlating wheat yield and tax delinquency the section of land was taken as the unit. By degree of delinquency, as used in this study, is meant the average number of years each of the 40 acres in the section is tax delinquent. The tax data were taken from the tax delinquency map. The wheat-yield maps used were prepared by H. D. Scudder of the Oregon Agricultural Experiment Station and E. B. Hurd of the Bureau of Agricultural Economics.

†The coefficient of correlation is a statistical unit of measurement indicating degree of relationship. A positive coefficient of correlation indicates that cases or frequencies in the two or more series compared bear a direct quantitative relationship to each other. For example, the greater the rainfall, the higher the crop yield. A negative coefficient of correlation indicates an inverse relationship. For example, the lower the yield, the higher the price.

‡The results for the townships of the five counties are as follows:

Umatilla County	11 townships positive;	19 townships negative
Morrow County	6 townships positive;	12 townships negative
Gilliam County	7 townships positive;	12 townships negative
Wasco County	10 townships positive;	10 townships negative
Sherman County	10 townships positive;	9 townships negative
	44	62

technically called "probable error," is too high. Furthermore, in view of the fact that in 42 per cent of the townships the relationship between wheat yield and tax delinquency was found to be positive and in 58 per cent of the townships the relationship was found to be negative, no proof of any causal relationship between the two magnitudes, wheat yield and tax delinquency, is established by these calculations.*

In order further to test the possible existence of any relationship between wheat yield and tax delinquency, the entire wheat areas of the counties were treated as units. The results obtained were but little more convincing than those arrived at in the calculations involving the individual townships. With the exception of the findings in the case of Umatilla County, only the slightest trace of any relationship between the two variables, wheat yield and tax delinquency, was evident. The coefficient of correlation or degree of relationship between wheat yield and tax delinquency for Umatilla County was found to be —.311. This figure indicates an inverse relationship, or in nontechnical terms it implies that the tax delinquency decreases as the wheat yield increases. The coefficient obtained, —.311, is not high, yet due to the large number of sections involved, 1,080, the possibility of mere chance relationship is practically eliminated.†

The results obtained from the data of the other four counties, Morrow, Gilliam, Wasco, and Sherman, indicate little more than the slightest tendency toward lower tax delinquency in the better yielding areas.‡

VII. CONCLUSIONS

The findings of the rural tax delinquency survey, initially a Federal undertaking and later completed as a state project, together with the results of this study, reaffirm the existence of a major cause, and point to probable minor causes, as responsible for the heavy rural tax delinquency in the State of Oregon during recent years.

The major and all-important responsible factor is the burdensomeness of the general property tax augumented in rural areas by the low farm incomes during the depression years.§

Certain variations in degree of tax delinquencies on the 1928 to 1932 tax rolls in some areas of the state, as revealed in this study, point to the probable existence of minor contributing factors.

The burdensomeness of the general property tax is evident from the fact that the total delinquency in the state exceeded 46 million dollars in 1935 and

*The highest positive and the highest negative coefficients respectively for the townships of each of the five counties are as follows:

	Highest Positive	*Highest Negative*
Umatilla	+.267	—.634
Morrow	+.199	—.543
Gilliam	+.362	—.489
Wasco	+.872	—.583
Sherman	+.584	—.638

†Probable error, .0185.

‡The coefficients of correlation obtained in the other countries are as follows: Morrow —.132, P.E. .02592; Gilliam —.078, P.E. .0255; Wasco —.134, P.E. .0244; Sherman —.143, P.E. .0252. A coefficient of correlation of less than six times the probable error is generally considered meaningless.

§Levies on equalized rural valuations rose during the 25-year period, 1910 to 1935, as follows: In Coast counties from 19 to 48 mills; in the Willamette Valley counties from 14 to 29 mills; in Southern Oregon counties from 14 to 31 mills; and in Eastern Oregon counties from 13 to 29 mills.—W. H. Dreesen "Public Expenditures in Oregon." Station Bulletin, No. 346, pp. 53.ff.

that the counties are now holding in excess of 1,780,000 acres of tax-reverted lands and 154,000 city and suburban lots. If an institution, like the general property tax system, virtually breaks down during a period of additional stress, it is highly probable that there is no appreciable factor of safety during normal times. To the degree that the taxpayers are on the verge of letting their properties revert to the county in lieu of unpaid taxes, the institution of private property loses its value as a stabilizing force in society.

The conditions or factors responsible for the variations in degree of tax delinquencies in various areas in the state, although of minor importance, deserve consideration to the extent that they are determinable and subject to the control of the assessor. The longer average period of tax delinquency on the less productive lands than on the more productive in the Willamette Valley counties, the inverse relationship between wheat yield and tax delinquency in Umatilla County, and the longer average period of unpaid taxes on grazing and timber lands than on wheat land in the same county, may not have swelled the total tax delinquencies by a large per cent; nevertheless, these variations deserve serious consideration by the assessment office. A careful reappraisal of all properties in the counties may be warranted.*

Careful study of individual properties, however, must precede any attempt to adjust assessed valuations on the evidence of existing variations in degree of tax delinquencies. Any one or more of several causes may be responsible for the existing discrepancies. The inferior lands may be over assessed and hence bearing an undue share of the tax load. The better lands may be in the possession of the farmer with superior managerial ability, industry, and thrift. Accumulated reserves may have enabled the farmer with the higher quality land to meet his public obligations more promptly and to withstand a more prolonged depression. The owner of the superior land may have a larger equity to protect, hence a greater incentive to meet his taxes.†

Historically, the general property tax was based upon the income concept. This was its theoretical background. But the term was construed to include income as measured by the tangible factors relating to the land itself, such as soil, climatic elements, and proximity to markets and not to include income as measured by the intangible factors of managerial ability, industry, and thrift of the operator.

Any adjustment in the assessed valuations, solely in conformity with disclosed variations in degree of tax delinquency, might readily work a great injustice on the man able and willing to meet his public obligations promptly. It might in fact result in penalizing managerial ability, industry, and thrift. The burdensomeness of the general property tax remains the primary cause of the problems arising in connection with its administration and collection. Correction of the inequalities in assessments as between individual properties on the one hand, and to the degree that they may obtain, between classes of taxpayers or areas on the other hand, would have an ameliorating effect, but would scarcely make a beginning in solving the problem of tax delinquency and the major ills growing out of it such as the reversion of private lands into public ownership,

*The more inclusive and serious problem, inequalities in assessments of individual properties, although not treated in this study, undoubtedly remains the most important reason for making a careful reappraisal of taxable real properties in the state.—W. H. Dreesen, "A Study in the Ratios of Assessed Values to Sale Values of Real Property in Oregon." Station Bulletin 233.

†The author recognizes that superior managerial ability and industry would have little effect if the owner were an absentee landlord.

economic insecurity, and instability of land tenure.* Some major changes in tax structure and in the division of functions between the state and the local governmental units are imminent in a continuously rising tax load in the absence of a compensating increase in tax-paying ability.

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Without the financial assistance of the Works Progress Administration and the efforts of the conscientious workers in every county the basic data for this project could not have been collected. For their assistance in making the numerous calculations necessary for this project special credit is due to Misses Evelyn South and Audrey Scovell.

APPENDIX

Pertinent Facts From the Analysis of the Rural Tax Delinquency Data of Nine Oregon Counties as Made by the Division of Agricultural Finance of the Bureau of Agricultural Economics:

"Rural real-estate tax delinquency on the 1932 levies in nine Oregon counties† involve over 4,000,000 acres out of a total area of 10,500,000 acres. The figure represents an increase of 487 per cent over the acreage delinquent on the 1928 levy. Not only did delinquent acreage increase, but delinquency per acre also increased. In the 1932 tax year the period of delinquency, for all properties involved, averages 2.5 years.

"In 1928 the delinquent area equaled 6.6 per cent of the total area of the nine counties, and in 1932 the corresponding figure was 38.8 per cent.

"Relative increases in delinquency varied widely between the nine counties and between general taxes and special assessments, and to a lesser extent between types of property. The greatest increase in delinquent general taxes for the period was 1164.5 per cent, in Douglas County, and the least increase was 234.2 per cent, in Coos County. The delinquency in Douglas County represented almost exclusively forest and miscellaneous types of real estate, while in Coos County more than one-fourth of the delinquency reported was of farm land. Special assessments were relatively unimportant in the rural delinquency of either county. The area delinquent in the nine counties in 1932 was distributed as follows: 37 per cent in farms, 28 per cent in forest, 5 per cent in 'cutover', and 30 per cent in all other types."

*The author does not mean to imply that the general property tax is universally and excessively burdensome in all parts of the state or that it is excessively burdensome in any area at all times. The existence of weak spots in the state, however, are apparent to all observers of the tax situation.

†Benton, Clackamas, Columbia, Coos, Douglas, Hood River, Sherman, Umatilla, and Union.

Table 8. "Total Delinquency of Rural Real-Estate Taxes, Nine-County Total, by Year of Levy, 1928-1932."

Year of levy	Properties involved		Assessed valuation	Amount of taxes delinquent
	Number	*Acres*	*1,000 dollars*	*Dollars*
1928	6,415	694,274	10,994	356,977
1929	9,335	1,069,962	16,058	518,859
1930	16,494	2,364,862	40,902	1,204,727
1931	24,148	3,417,383	59,252	1,533,609
1932	29,144	4,077,979	66,743	1,812,562

Table 9. "Unpaid Delinquency of Rural Real-Estate Taxes, April, 1934, Nine Counties by County and by Year of Levy, 1928-32."

County	Acreage *Thousands of acres*					General taxes *Thousands of dollars*					Special assessments *Thousands of dollars*				
	1928	1929	1930	1931	1932	1928	1929	1930	1931	1932	1928	1929	1930	1931	1932
Benton ..	19	29	73	129	188	6	10	36	54	90	*	1	1	2	2
Clackamas	26	44	90	175	251	13	34	96	168	260	1	1	2	3	3
Columbia..	20	39	78	193	237	10	32	58	128	183	11	16	53	14	20
Coos	78	140	242	447	479	31	71	161	308	298	2	9	7	14	12
Douglas....	81	211	458	726	977	24	61	124	186	268	1	3	8	11	14
Hood River....	16	22	38	70	96	15	26	50	73	99	11	18	34	54	57
Sherman..	18	47	222	265	314	4	8	56	54	75	0	0	0	0	0
Umatilla...	37	93	364	566	799	12	26	122	153	258	7	8	14	20	21
Union.....	45	63	162	313	552	7	16	51	90	156	0	0	0	0	0
TOTAL...	340	688	1,727	2,884	3,893	122	284	754	1,214	1,687	33	56	119	118	129

*Less than $500.

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