

The World's Largest Open Access Agricultural & Applied Economics Digital Library

## This document is discoverable and free to researchers across the globe due to the work of AgEcon Search.

Help ensure our sustainability.

Give to AgEcon Search

AgEcon Search
<a href="http://ageconsearch.umn.edu">http://ageconsearch.umn.edu</a>
<a href="mailto:aesearch@umn.edu">aesearch@umn.edu</a>

Papers downloaded from **AgEcon Search** may be used for non-commercial purposes and personal study only. No other use, including posting to another Internet site, is permitted without permission from the copyright owner (not AgEcon Search), or as allowed under the provisions of Fair Use, U.S. Copyright Act, Title 17 U.S.C.

## **Historic, Archive Document**

Do not assume content reflects current scientific knowledge, policies, or practices.

(\* - \*) / Lu-la

## UNITED STATES DEPARTMENT OF AGRICULTURE Economic Research Service

## CURRENT AND FORESEEABLE TRENDS IN RURAL POPULATION

Talk by Calvin L. Beale
Economic and Statistical Analysis Division
at the 40th Annual Agricultural Outlook Conference
Washington, D. C., 9:15 A.M., Wednesday, November 14, 1962

Seldom has a Nation changed its demographic course more quickly and thoroughly than did the United States between the outbreak of the War in Europe in 1939 and the period immediately following its own entry into the conflict in 1941. In 1939 births did exceed deaths, but only because the older generation from which most deaths occurred was smaller than the younger generation that was bearing children. City people were having 25 percent fewer children at the time than were necessary to replace themselves, a deficit that was not quite offset by the higher fertility of rural people. Three years later in 1942 the excess of births over deaths had doubled.

This surge of fertility reached its full expression after the war and continues with little abatement today. In conventional outlook terms our 1962 population production will be about 4.3 million units, down slightly from the previous year; disappearance will reach 1.7 million units, up slightly from last year; foreign trade is yielding a net import of .3 million, essentially unchanged; and stocks on hand will have risen by 2.9 million at year's end. The result is that the total population is now approaching 188 million. One way of assessing the rate of growth is to note that although there has not yet been time enough to publish all of the results of the 1960 Census of Population, more than 8 million people have been added to the population in the interim since the census was taken.

Rural Population Change.--The rapid and well-publicized growth pattern of general population has not been typical of all elements of the population, however. The Nation had 54,054,000 rural people in 1960, comprising 30 percent of the total population. (This figure includes all persons living in the open country plus those in places of less than 2,500 inhabitants that are beyond the densely settled suburban fringes of metropolitan citics.) Ten years earlier the rural population was more than 400,000 higher, but the difference can be accounted for by slight changes in the method of defining urban and rural. Essentially, the total rural population was stationary during the 1950's but with large redistribution. The South Central and Plains States had substantial rural losses which were nearly offset by gains in the Northeast, the Lower Great Lakes Area, Florida and the Pacific States.

At the heart of the stationary overall level of rural population was the extensive change taking place in agriculture, reflected by a rapid decline in the farm population. Precise comparisons of farm population data over the last decade are difficult, because of the radical alteration in the definition of farm residence that was adopted in 1960. The official figure on the new definition for 1960 is 15,635,000. We estimate that the comparable figure in 1950 may have been as high as 23 million. 1/

1/ The figure of 15,635,000 is an annual average for 1960 derived from the Current Population Survey of the Bureau of the Census. The enumerated farm population in the 1960 Census was 13,445,000. The reasons for this discrepancy are not fully understood. Some evidence is available that suggests the Current Population Survey figure may be somewhat too high, but that the 1960 Census count is too low.

Table 1.--U. S. Population, by Residence: 1960

To ! !	P	opulation	Percent	change	since 1950	
Division	Total	Urban	Rural	Total	Urban	Rural
United States New England Middle Atlantic East North Central West North Central South Atlantic East South Central West South Central Mountain Pacific	: (000) : 179,323 : 10,509 : 34,168 : 36,225 : 15,394 : 25,972 : 12,050 : 16,951 : 6,855 : 21,198	(000) 125,269 8,032 27,808 26,435 9,046 14,852 5,831 11,478 4,601 17,186	(000) 54,054 2,478 6,360 9,790 6,348 11,120 6,220 5,473 2,254 4,012	18.5 12.8 13.3 19.2 9.5 22.6 5.0 16.6 35.1 40.2	29.3 13.1 14.6 24.8 23.8 42.9 30.0 42.1 65.1 52.9	8 12.0 7.9 6.3 -6.0 3.0 -11.1 -15.2 -1.5 3.6

Source: U. S. Census of Population: 1960. Number of Inhabitants, Tables 9, 10, and 20.

For many years the rural population was widely thought of as synonymous with the farm population. A century ago the proportion of the Nation's workers engaged directly in farming was 3/4 as high as the proportion of the total population that lived in rural territory. It was only in the 1920 Census that data were first published for rural-farm and rural-nonfarm people separately.

Population composition .-- Today's rural population is a very heterogeneous group. Hardly 1/4 of it consists of farm residents. In the rural-nonfarm majority there are many people whose lives are closely linked with agriculture, such as farm laborers, agricultural processors, suppliers of farm equipment, and others. On the other hand there are millions of rural people without any meaningful agricultural connections. They work in nonfarm industries-many commuting to the city-or are retired, or make up the population and staff of the colleges, institutions, and military installati⊌ns that are located in rural territory. Rural people may be living in densities of 40 or more households per square mile, with cities all around them, as they do throughout Southern New England. Or, they may be in areas settled so thinly that there is only one household for every 3 or 4 square miles, as in Wyoming or Nevada, with even the smallest urban place a considerable distance away. It has become widely understood that a majority of the American people are urban and that most population growth in recent times has been metropolitan. What seems to be less understood, however, is that the urban population is so heavily concentrated in metropolitan areas in and around cities of more than 50,000 people (80 percent of the urban total) that the nonmetropolitan population is still predominantly rural. Notwithstanding the thousands of small towns and cities of under 50,000 inhabitants that dot the Nation, only 39 percent of the nonmetropolitan population is urban. Furthermore, despite the expansion of the large cities, nonmetropolitan areas still occupy 9/10 of the land area of the country, even excluding Alaska.

County trends. —In 1950 there were a little more than 2,400 counties in the Nation that were entirely or primarily rural in their population. During the following decade 3/5 of them declined in population, because

of migration of people to other areas. In general, if a county were entirely rural the chances were 3 out of 4 that it would drop in population; if primarily rural, but with at least one urban place, a county had a 50-50 chance of not declining. Of the 2/5 of all rural counties that gained, the majority did not gain enough population to equal all of their excess of births over deaths. In other words, their population grew slowly, accompanied by the loss of some of their people to other areas-usually young people. Only 353 rural counties, or 15 percent of the total, had enough economic development to absorb all of their natural population increase and possibly attract migrants from elsewhere.

In this latter group, the most important single influence producing growth was physical proximity to a metropolitan area, permitting commuting by rural people into the area or the expansion of metro activities and homes out into the countryside. Manufacturing was the second most common growth factor in the rapidly growing rural counties. However, expanded manufacturing — either alone or with some other activity—was able to offset agricultural losses and prevent net outmigration of people in only about 6 percent of all rural counties. Military expansion was the third most frequent rural growth factor, followed by growth of institutions (such as colleges, hospitals, and prisons) and recreation or retirement activities.

Ratio of males to females.—Rural people have several distinguishing features as a population group. For one thing, there are fewer age groups in the rural population than in the urban that have a large imbalance between the number of males and females. Secondly, the direction of the imbalance differs. Rural areas still have somewhat more males than females, in contrast to cities and suburbs where women are in the majority at all ages above 15. One of the principal reasons for the retention of men in the rural population is the fact that many of the most common rural industries — such as farming, mining, logging and milling, and military work — employ relatively few women compared with urban—centered industries. But, even among young children under 15 years old the ratio of males to females is higher in rural areas than in urban areas, a condition for which we have no adequate explanation.

Fertility. -- Another feature of the rural population is its high fertility. The sharp increase in marriage and child bearing among city people in the last 20 years has greatly narrowed the gap between urban and rural fertility, but has by no means closed it. Consider the case of women 35 to 44 years old in 1960, a group that bore most its children during the war and post war period and that is now within five or six percent of having completed its childbearing. Urban women in this group are having an average completed fertility of 240 children per 100 women, whereas rural women are having an average of 310 children per 100 women. Allowing for children who are born but fail to survive through the childbearing years, about 220 children per 100 women are necessary for population replacement. Comparing this quota with completed fertility, the urban women can be said to have borne children at a rate about 10 percent above the replacement level. The rural women, on the other hand, have had 40 percent more children than needed for replacement. Among rural-farm women this excess is more than 55 percent. Needless to say, such a differential has considerable impact on the economic and educational problems of rural areas.

We have had a movement of people out of rural areas, especially from farming areas. But, unless rural job opportunities expand, this migration

Table 2.--Males per 100 Females, by Residence, 1960

Age	:	Total	:	Urban	:	Rural Nonfarm	:	Rural Farm
All ages Under 15 years 15 to 19 years 20 to 24 years 25 to 34 years 35 to 44 years 45 to 54 years 55 to 64 years 65 years and over		97.0 103.6 101.7 95.7 95.9 95.2 96.7 93.0 82.1		94.0 102.9 95.1 89.2 95.1 93.4 93.3 89.1 75.7		103.3 104.8 114.2 113.4 99.1 101.4 104.6 99.0 93.5		107.2 106.0 120.0 118.5 93.7 95.6 107.6 113.9 117.3

Source: U. S. Census of Population: 1960. United States Summary, Table 65.

will not <u>permanently</u> resolve the surplus of labor emanating from rural areas. Because of the relatively high level of child bearing by rural families there will be about 177 rural boys reaching age 18 during the 1960's for every 100 older rural men who are expected to vacate existing jobs through death or retirement. Unlike the urban population during the depression of the 1930's rural families have not reduced their rate of childbearing as one means of adjusting to the economic difficulties that most rural areas have had in the last decade.

Age and migration.—The total rural population does not vary greatly from the urban population in its age distribution except for a somewhat higher proportion of children and somewhat lower proportion of adults of working age. The rural-farm population differs greatly in age composition from either the urban or rural-nonfarm groups. The farm population has a heavy base of children up to age 18, then a very small young adult group 18-34, with the bulk of the adult population being middle-aged. The largest 5-year age group of farm people consists of those 45-49 years old. Farm people 60-69 years old actually outnumber those who are 20-29. (By contrast, persons 20-29 outnumber those 60-69 by 80 percent in the rural-nonfarm population and by 65 percent in the urban population). The curious age structure of the farm population is the product of the heavy outmigration of young adults is over the last 20 years.

The departure of young farm people has been so heavy that the number of births in the farm population is now declining due to the shortage of potential young parents. In fact, in some rural counties the number of births occurring has recently fallen below the number of deaths. In 1959 there were 33 counties in the United States having more deaths than births. In none of them had there been an excess of deaths in 1950 at the beginning of the decade. Most of the affected counties are in the Corn Belt or in Texas. The fact that they have more deaths than births may be transitory and later reversed when the current phase of agricultural adjustment is more nearly complete and the age composition becomes more normal. An excess of deaths is not likely to appear in the majority

Table 3.--Percent Distribution of U. S. Population by Age, by Residence, 1960

Age	:	Total	Urban	: Rural : Nonfarm :	: Rural : Farm :
All ages Under 5 years 5 to 9 years 10 to 14 years 15 to 19 years 20 to 29 years 30 to 44 years 45 to 64 years 65 years and over		100.0 11.3 10.4 9.4 7.4 12.1 20.1 20.3 9.1	100.0 11.2 10.0 8.8 7.0 12.5 20.7 20.6 9.1	100.0 12.1 11.3 10.3 8.0 12.2 19.0 18.1 8.9	100.0 9.9 11.0 11.6 9.4 8.4 17.0 23.3 9.3

Source: U. S. Census of Population: 1960. U. S. Summary, Table 65.

of rural counties, but its existence in even a few is symbolic of the scope and depth of the population changes that currently characterize many rural areas. As we have said earlier, the fertility of farm families of childbearing age is relatively high. The natural decrease of population in the 33 counties mentioned results solely from the distorted age structure which finds the older generation, from which most deaths occur, being much larger than the young generation to which children are born.

During the 1950's, at least 70 percent of the net migration from farms consisted of young people under age 20 or who reached age 20 during the decade. From a demographic point of view, it is the failure to understand the extent and pattern of recent migration from the farm that constitutes a major defect in any proposal for the government to speed-up the movement of large additional numbers of workers out of agriculture, as a presumed means of improving the condition of such workers and of remaining farmers. The workers referred to in such proposals are those not presently making a good income from farming. What such proposals overlook is the fact that the bulk of all low-income farmers are middle-aged or older. In 1960, 70 percent of the farm operators who sold less than \$10,000 worth of products were 45 years old and over. (Only 53 percent of those selling \$10,000 worth or more had reached their 45th birthday). Thus an induced movement of low-income farmers would have to be primarily focused on farmers of middle age or older. Quite aside from the difficulty of providing re-employment opportunities for such people, they are not likely on the average to be interested in uprooting themselves at such a stage of life. In a recent study in Minnesota, H. W. Baumgartner found that among 15 variables assumed to be associated with the potential mobility of farmers "...age exerted a more pervasive influence than any other factor", with farmers over 45 having much less potential for mobility than did young farmers. Age was more important than income level, education, previous nonfarm work experience, size of farm, past mobility, family ties to farming, or any of the other variables examined.2/

<sup>2/</sup> Baumgartner, H. W., "Factors Associated with Potential Mobility Among Farmers". Report delivered at 1962 Annual Meeting of the Rural Sociological Society, Washington.

Today we simply no longer have large numbers of young men farming inadequate-sized farms. The age composition of farm people suggests strongly that the large-scale movement out of agriculture of entire families with able-bodied heads is largely finished. The present decline in farm population-and the prospective decline for at least the next 15 years - is due principally to the exodus of those young people recently out of school who leave before ever becoming farm operators, and, secondly, by the death or retirement of older people from small-to medium-scale farms whose farms are then either taken over by other operators for enlargement or else are removed from agriculture altogether.

Future total rural population .-- In the area of the United States now classified as rural (farm and nonfarm combined), it can be said with assurance that the total population is increasing, and will continue to do so, for as urban places expand much of their growth takes place on land that is currently rural. This is quite different, however, from asserting that the rural population is now increasing, for the ultimate distinction between rural and urban is density of settlement. As rural territory becomes suburbanized the increased density changes the area's character and requires that the area and its residents be reclassified as urban. In 1960 there were about 17 million people living in urban territory that was officially rural 10 years earlier. future size of the rural population, therefore, depends in part on decisions as to what territory to classify as rural or urban. Recently, the size of areas that are termed urban has increased because of expanded annexation policies by cities and because of changed conceptions of what type of unincorporated territory is urban in character. In 1950, suburbs were classified as urban if they had approximately 2,000 or more residents per square mile. In 1960, this criterion was lowered to 1,000 or more persons per square mile, with a consequent enlargment of the amount of area classed as urban. Such changes reflect the fact that to an increasing extent urban and rural borders have become blurred and there is often no obvious boundary line between a city and its rural fringe. Furthermore, the lengthened range of commuting and the suburban dispersal of business and industry have probably extended the size of the fringe areas in which the population is now thought of as urban in character.

It would seem that nearly all of the net population gain that will accrue to present rural areas in the 1960's will be urban in character and will be reclassified as urban in 1970. (Such reclassifications are made only once per decade.) Within the territory that remains rural in both 1960 and 1970, losses in farm and mining areas are likely to offset most of the rural gains elsewhere. Barring changes in census procedures, the total rural population may be about 55 million in 1970. This would be the approximate result if the 1950-60 rural rates of change by counties were to persist in the 1960's.

By 1970, however, the foreseeable downward adjustements in the rural farm and mining populations will be so far advanced that further losses in those groups should be more than offset by growth in other types of rural population. Thus during the 1970-1980 decade, with these adjustments nearly completed, the rural population might rise to about 60 million. Even such a rise would represent a rate of growth less than half that expected in the Nation as a whole. Rural people would comprise about 22 percent of the Nation's total population.

Future farm population.--What proportion of the rural population will consist of farm people by 1980? There is no precise way of forecasting such a number for a population whose size will be primarily determined by the uncertain future pattern of farm adjustment and human migration. In 1950, the farm population was 42 percent of the rural total and by 1960 it had fallen to 29 percent. Since 1950, the size of farm population has been dropping at an average annual rate of about 4 percent. Such a loss cannot be expected to continue indefinitely, however, and farm population losses between the present and 1980 will probably not be as large either in rate or absolute amount as those that have occurred in the shorter period since 1950. This prospective slowing down in the changing relationship between the farm and nonfarm segments of the rural population suggests that by 1980 farm people may comprise between 15 and 20 percent of the total rural population.

Conclusion .-- In the formative period of our history, our society was dominated by agrarian values that stemmed from the predominance of the agricultural population. These, as reflected in our national literature, were superseded in politics, in work relationships, and in standards of conduct by the urban value system that emerged with the rise of the cities. Today, with the central cities declining, suburban values are coming to the fore. The rural population, as defined statistically, is a residual after the urban and suburban elements have been identified. Yet for many administrative purposes it has a legal standing and the people who comprise it are treated as a common clientele with certain mutual interests. It will be interesting to observe in the future, as the agrarian element becomes an increasingly minor part of the rural total, whether the term "rural" will be a meaningful name for a reasonably common way of living and for a reasonably common set of social and economic problems, or whether "rural" areas will become so diverse or sc closely linked to the larger society, that other terms to identify and describe the human ecology of these areas will develop.