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# SOVIET AGRICULTURE:



## Elusive Supply Response Keeps Pressure on Reforms

by Karen Brooks

*Over the past year the Soviet agricultural system has been exposed to public scrutiny without the protection of traditional ideology and the selective use of statistics. The first set of efforts to change things—the much heralded leasing system—has had little impact, but the time for real change to occur has been very short.*

*To date, the reforms are not clearly articulated. And there is no guarantee that they will succeed when and if implemented. However, spurred by increased food shortages and the general financial crises, Soviets and their politicians have little choice: the structure of agriculture must change. Whether agricultural reforms succeed or fail, the events of 1989 may be as momentous for the twenty-first century as the 1929 Soviet collectivization of their farms was for the twentieth.*



Last year, the Communist Party of the Soviet Union initiated an agrarian reform program that is intended to relieve food shortages and reduce the huge subsidies that now go to Soviet agriculture. The plan, which may take some time to implement, is designed to change labor incentives on state and collective farms and free farm managers and workers from the meddling of off-farm bureaucrats. Previous attempts at agrarian reform have been half-hearted and ineffective. The outcome of the steps initiated in 1989 may be different, however. The financial crisis on Soviet farms has escalated. In addition, budget problems in the central government reduce the number of available policy options and force a reconsideration of the institutional framework that governs the state and collective farm system.

## Expensive Agriculture

At the time of Stalin's death in 1953, Soviet agriculture was in shambles. Output and productivity were low, and most of the rural population was only tenuously linked to the monetary economy. Stalin's legacy stemmed from his continuous efforts to extract resources from agriculture through taxation and disinvestment. Under Khrushchev, and even more so under Brezhnev, the mandated remedy for Soviet agriculture was large-scale reinvestment, monetization of agricultural wages, and periodic reorganization of the agricultural bureaucracy. The program had almost a quarter century to prove itself. By late 1987, a combination of declining hard currency earnings from oil and gas, a worsening debt position in agriculture, and the growing financial demands of industrial reforms forced a reconsideration of agricultural policy. The reluctant (and far from unanimous) conclusion was that the old Stalinist institutional structure of state and collective farms could not absorb the volume of investment needed to modernize Soviet agriculture.

For much of the period since 1965, investments in production agriculture—for structures, land improvements, farm machinery, and the like—absorbed 20 percent of all annual investment made by the entire Soviet economy. Since 1985, this proportion has fallen to 17 percent. Much of these investments reflect the strengths of local politicians rather than returns to agricultural resources.

Investments are often made in the wrong places or in the wrong projects. These mistakes are reflected in the continued high proportion of the labor force employed in agriculture. In 1970, 25 percent of the nation's labor force was involved in primary agricultural production or in managerial and clerical tasks directly associated with production agriculture. By 1987, the number had fallen only to 19 percent—a relatively small decline given the size of the

investment program.

Collectivized agriculture is also expensive because purchased inputs are poorly used. They are used extravagantly when they are available. For example, average fertilizer use per hectare in the USSR is the same as in Minnesota, but in regions where climates and soils are most like Minnesota, Soviets apply more than twice as much. On many farms machines stand idle for lack of spare parts or operators, but they are not sold to farms that could use them. In addition, excessive losses in transport, storage, and processing raise the real cost of the food that actually reaches consumers.

## Dissatisfied Consumers

Even though food is highly subsidized, families must still spend a high proportion of their earnings on groceries. Families with per capita earnings of twice the official poverty level spend, on average, one-third of their disposable incomes on food. Depending on the location, beef sells in government stores for 1.7 or 2 rubles per kilo, or about \$1.50 per pound at the current grossly overvalued official exchange rate. At a more realistic exchange rate, food prices would look much lower in international comparisons but



*Supplies of food in state stores lag increasingly behind demand at regulated official prices. Prices at the farmers' markets can rise to reflect demand, and now average about three times state prices.*

*All photos courtesy Christian J. Foster, ERS, USDA*

would still be expensive for many Soviet families. Low official retail prices do not make food cheap.

Retail prices in government run food stores do not cover the high costs of production. The low official prices, which have not increased since 1962, encourage consumers to empty store shelves and then to feel resentful that the items they can afford (at official prices) are not always available. Most Soviet consumers view the pervasive shortages and lines as supply side problems related to the ineffective production processes in Soviet agriculture. The effects of changing demands are not recognized. Nominal wages have more than doubled since 1962, but consumers do not consider that their rising money incomes would likely keep the stores

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*The giant machines of the state and collective farms are of little use to small scale leaseholders or proprietors. They often stand idle for lack of spare parts even on the large farms.*

empty even with expanding supplies of many food items so long as nominal prices are not permitted to increase.

Excess demand in the state retail sector spills over to the collective farm market where farms can legally sell some of their output at market clearing prices. In 1987, prices in collective farm markets were reported to average 2.72 times official state retail prices, although the price differential varies by location, season, and product. The market clearing prices from the collective farm markets affect transactions in the government stores. Clerks know that the meat they sell for two rubles would bring five or six rubles in the collective farm or "free" market. Moreover, customers must stand in line, accept indifferent service, take bones at the same price as meat, and occasionally offer bribes. The real price they pay, including the wait, the bribe, and the bones, is higher than the official government price.

Many products are not available in state stores, but are distributed at official prices in factories and places of employment. Middle class employees who are permitted to buy these rationed quantities through the workplace probably pay close to the official price. However, in the process, supplies are diverted away from retail market channels. People who are poor, retired, or live in the countryside have little access to food at state prices. They must pay the higher prices charged by sellers in the collective farm markets.

### **State Budget Covers Losses**

The state subsidizes the difference between the price the state pays the farms for farm products and the lower prices the state obtains through the state store system. The subsidy in 1989 cost 90 billion rubles—almost ten percent of GNP.

The financial burden of the subsidy has been growing, especially since a producer price increase in January, 1983. A further producer price increase was scheduled for January, 1990, but has been postponed because the budget cannot withstand it. Estimates of the budget deficit (recently revised downward to 92 billion rubles) show the agricultural price subsidy equal to the entire Soviet Government budget deficit. A deficit of this magnitude has severe

macroeconomic effects, and officials are reluctant to add to it by raising producer prices for food.

The data on subsidies actually understate the payments the state makes to the farm sector. In the past, poor farms have been encouraged to increase wages for their workers and to borrow money if revenues were inadequate to meet the wage bill. Many of these debts cannot be repaid, so the state will eventually absorb them. A large portion of this farm debt should be considered an additional subsidy. In December of 1989 the government announced the intention to write off fully half of outstanding farm debt (73.5 billion rubles). Farms hold one-third of all bank loans in the country and the implications for the banking system and the budget of this massive debt forgiveness are still unclear.

### **Sensitivity to Food Prices**

One possible remedy is to increase official retail food prices, but the quandary about how, how much, and how to compensate people for the increase has stymied officials.

A general price reform scheduled for 1990-91 was postponed indefinitely in large part because of the public's sensitivity to increases in food prices. There is now widespread agreement that food prices cannot be increased until suppliers can assure the government that more products will be available at the higher prices. Unfortunately, food prices cannot be excluded from a general price reform without introducing even greater relative price distortions, and since food prices cannot be changed, the whole economic reform is jeopardized. Continuing the distorted prices in agriculture will compound the difficulties of transition to the new system. In March of 1989, Gorbachev announced that retail prices for most basic foods would remain unchanged for two to three years.

### ***Most Soviets now recognize traditional collectivized agriculture is a luxury that they can no longer afford.***

### **Leasing, One Approach**

Since retail food prices can not be raised, the full burden of adjustment falls on reducing the costs of production. The trick is to find a graceful formula that releases workers from the constraints of farming on collective and state farms without dismantling the farms themselves. One proposal is a lease contracting system similar to the household responsibility system that was used in the Chinese agricultural reform. Under this plan individuals or small groups of workers negotiate with the manager of a state or collective farm to lease a portion of the farm's land and working capital in exchange for the promise to deliver a specified quantity of output. Workers on lease contracts earn the right to any profits but give up the right to guaranteed wages. Workers on poor and indebted farms are unlikely voluntarily to trade secure wages for earnings that are, on average, both riskier and lower. On the wealthier farms where productivity is higher, many workers could earn more under the leasing system, but farm managers are reluctant to relinquish control over these farms.

The Soviet press is watching and writing about the farm families who are taking out lease contracts. Although much of the attention is well-orchestrated propaganda, the sense that finally, after 60 years, there are economic opportunities for ambitious people in the



Soviet countryside is tremendously important. All of the agricultural newspapers and magazines feature personal accounts of successful leaseholders as well as reports of the rise in the productivity of their herds and lands.

Many agricultural workers, however, are not convinced that they can benefit from the terms of the leases, so they have not sought to farm on their own. Some emphasize the lack of legal guarantees for leaseholders, while others are daunted by the prospect of long hours of manual labor with very little machinery suitable for small scale operations. Some observe that the success of a lessee depends less on his or her managerial skills than on whether or not the collective farm manager delivers fuel, seed, and feed according to the contract. Astute observers note that leasing under current conditions may be a way to transfer the high costs of Soviet agriculture from the government budget back to the people who work the land. They prefer to wait and take out their leases only when the marketing system for inputs and outputs works well enough to reduce these costs and risks.

After the leasing system was announced at the March Plenum of 1989, a conservative politician considered to be an opponent of changes in the collective and state farm system emphasized that the program was voluntary for both the workers and the managers of the collective and state farms. If the program remains voluntary without a substantial change in the incentive structure, implementation may remain slow, and hopes for increasing the supply of farm commodities through this form of "privatization" will remain dim.

The leasing program is further threatened by continued bureaucratic interference on the collective and state farms. Managers of these farms will be more willing to allow parts of their huge holdings to be farmed by individual farmers if bureaucrats at the district and provincial levels stop issuing orders such as the timing of field operations. Despite repeated condemnations since Khrushchev's time, bureaucratic interference in farm management has persisted and has made present managers cautious about any changes.

Gorbachev has tried several reorganizations in an effort to make the bureaucracy enhance rather than impede food production. In 1985 he collected many fragmented ministries to form *Gosagroprom*, a super ministry of agriculture that soon gained a reputation as the monster of Soviet bureaucracy. In March 1989, Gorbachev acknowledged that his reorganizations had not worked. *Gosagroprom* was dissolved and replaced by a smaller agency. The implications of this latest reorganization are still unclear.

The attempt to streamline the bureaucracy so farm managers and workers have more authority and better incentives is in direct conflict with recent increased emphasis on regional self-sufficiency in food production. Moves to give republics and oblasts (a jurisdictional unit similar in size to a state in the United States) greater political autonomy and financial independence have been accompanied by increased rhetoric for regional self-sufficiency. Republic and oblast party leaders are no longer required to deliver as much agricultural output to the central fund used for redistribution around the country. At the same time, they are warned that they cannot continue to depend on central supplies to meet local needs.

The regional party leader is ultimately responsible for the adequacy of the regional food supply. If supply from the center is reduced and not replaced by a rapid expansion of inter-regional trade in food, regional and local party leaders will place their own procurement quotas on the farms in an effort to generate adequate food supplies from local sources. Relaxing quotas at the national level while increasing pressures for local self-sufficiency can worsen the inter-regional distribution of food production.

The rhetoric of regional self-sufficiency may be a short run response to the budgetary crisis and worsening shortages, but the short run is long enough to stifle incentives for leasing and other attempts at meaningful farm autonomy.

## Another Farm Debt Crisis

High costs of production coupled with low and unchanging retail food prices have required a large and growing subsidy to Soviet agriculture. Concern about the growth of the subsidy has, in turn, increased the reliance on indebtedness to keep poor farms in business. Higher prices or outright grants could be used, but the former are politically unacceptable and the latter would appear immediately as more subsidies in the government's accounts. Increases in efficiency that bring down costs of production will ease the financial crisis, as well as the eventual and inevitable increase in retail food prices. These are both, however, viable only in the medium or long term. The crisis is immediate. What can be done to improve the financial condition of Soviet agriculture now?

Under the current program, farms that are bankrupt have two years of grace in which to improve their financial condition. If they are still insolvent in 1991, they may be declared legally bankrupt and their assets will be leased to anyone who will take them. This is not a popular policy. Conservatives who seek to defend collectivized agriculture denounce bankruptcy as a violation of the social contract that exists between the state and the agricultural work force. They would rather continue the high subsidies and save existing institutions. Similarly, the new emphasis on regional self-sufficiency adds to the controversy over bankruptcy: local leaders will fight to keep their own high-cost farms operating in order to meet local needs and quotas.

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## Sixty Years of Collectivized Agriculture

In September of 1929, few observers foresaw what collectivization would mean for rural people in the USSR, for the Soviet economy, and for the world agricultural economy. However, most Soviets now recognize traditional collectivized agriculture is a luxury that they can no longer afford. The announcement of agricultural reform in March of 1989 was important because it began a process which, if continued, will have widespread effects on property rights, incentive structures, and markets, and thereby have pervasive effects on Soviet agriculture.

## A Step Toward Private Ownership

The poor response to leasing has led to a more dramatic step toward privatization. According to provisions of a new law governing land tenure introduced in draft form in early December 1989, individuals can become "proprietor-operators". Proprietors have inheritable title to their land, and have ownership rights excluding purchase, sale, or mortgage. The "proprietor-operators" need not have any links to collective or state farm managers unless they choose to. Units of local government are given power to confiscate state and collective farm lands and reassign them to small holders.

Drafters of the land law hope that proprietorship will be more attractive to agricultural workers than leasing has proven to be. Many impediments to leasing, however, such as imperfections in input and product markets, apply equally to proprietorship. Inheritable proprietorship of up to fifty hectares of farmland became legal in Lithuania in July of 1989, and does not appear to have produced a rush of applicants yet. C