Most Americans live in urban areas and have little direct contact with farmland on a daily basis. Yet there is strong evidence that the public has an interest in preserving farmland. The Land Trust Alliance reports that between 1998 and 2003, voters across the nation approved more than 500 ballot measures providing more than $20 billion to protect farmland, open spaces and environmental quality.

The United States is a country with seemingly ample farm and ranch land. Pasture, range and crop land comprise the majority of the land in the contiguous 48 states, with only 3% developed. (See chart.) There has been rapid development of farm and ranch land in areas adjacent to urban areas, oftentimes leading to sprawl, traffic congestion and loss of land with potentially high levels of agricultural productivity. When development occurs, it is virtually never reclaimed for agricultural uses.

All states and many localities are doing something to protect farmland and other open lands. The federal government became a major player in farmland preservation with the passage of the Farm Security and Rural Investment Act of 2002, which earmarked $985 million in grants to state and local governments and non-profit land trusts to preserve farmland.

Program Design Options

A major policy issue is designing a program that will preserve particular land parcels. Any policy to protect farmland involves rules that will help some interests and hurt others. The basic powers governments use to preserve farm and ranch land fall into three general categories: taxation, regulation and spending.

Taxation: Raising or lowering taxes has long been used to encourage actions deemed socially desirable or discourage those that are not. In 1956, Maryland became the first state to tax farmland on the basis of its agricultural value rather than full market value. Today, all states but Michigan have some type of use-value assessment program, designed to reduce a farmer’s cost of remaining active in farming.

Internal Revenue Service codes provide income and estate tax incentives for the donation of the development value of open land. Researchers agree that, long term, preferential property taxes alone will not keep land in farming.

Regulation: Every state but Hawaii—which has statewide agricultural districts—delegates zoning authority to local governments to act on behalf of the “health, safety and general welfare” of the local citizenry.

Source: USDA
Oregon requires counties to include agricultural zones in their growth management plans. Maryland and California have county zoning ordinances that establish permitted uses consistent with active farming. Some Pennsylvania townships have adopted agricultural zoning ordinances that view farmland as a “developed” use rather than vacant land waiting to be developed. In these states, the farmland protection zones recognize farming as a land use to be retained in the public interest.

The fairness of agricultural zoning is a major point of debate. Is it “fair” to remove or divert development potential from farmland through regulation, essentially requiring the farmer to bear the cost of achieving the public purpose of preserving farmland? The question usually comes back to the “takings issue.”

Courts have consistently upheld agricultural zoning as a legitimate legislative exercise of police power. Thus, it appears agricultural zoning is a legally “fair” limitation on individual discretion because it is done for the health, safety and welfare of the broader public. It could be argued that much of the land value an owner worries about losing to public regulation was in fact created by other public decisions regarding roads, water and other infrastructure.

At best, agricultural zoning provides medium-term protection. Zoning is a political decision and can change over time. Rezoning, variances and changes in allowed density can undermine the protection of commercially viable agricultural areas.

Spending: Spending is the most direct way government can influence private land use in the public interest. Government can negotiate with private landowners to buy development rights to ensure a land-use pattern that generates public benefit. Arguably, the purchase of development rights is the fairest method of accomplishing public purposes, because the public pays the market value of those rights.

Nationwide, nearly 2 million acres of farmland have been preserved through the purchase of development rights by governments and private land trusts. State and local governments alone have spent more than $1.5 billion to purchase these rights, also known as conservation easements. More than 20 states and 150 local governments have enacted programs to purchase agricultural conservation easements.

Despite strong interest in preserving farm and ranch land, there is a limit on the ability of governments to reduce or abate taxes on agricultural land or to purchase development rights to farm and ranch land. There also are important legal and equity issues associated with agricultural zoning, as well as program efficacy considerations.

Zoning and taxation policies are generally cruder policies because they are applied over large land areas, in contrast to the purchase of development rights for selected parcels. But the more precise targeting afforded by conservation easement programs raises a policy issue: What criteria should be used to select parcels eligible for the limited available funding?

Which Land to Preserve

Policy processes and actual investments are affected by debate over which farm and ranch lands to preserve. This debate is driven by recent changes in growth and development patterns throughout the United States, and the increasing popularity of the purchase of development rights to preserve farmland. The debate centers on four issues:

- Program coordination: There has been a significant increase in the establishment of smart growth policies geared toward managing the congestion, flow and visual amenities of metropolitan regions. Because urban growth and development are the key threats to farm and ranch land, smart growth policies complement farm and ranch land preservation programs. Unfortunately, these complementary policies usually are not managed by the same state or local agencies, resulting in a lack of coordination about where growth should be located or land preserved.

- Fairness and effectiveness: There is controversy over the fairness and effectiveness of agricultural zoning. Is it “fair” to simply remove or divert development potential from farmland through regulation, essentially requiring the farmer to bear the cost of achieving the public purpose of preserving farmland? Would it be fairer to simply buy the development rights from the landowner? If an ordinance relies on large minimum lot size to discourage development in agricultural areas, there is little reason to expect farming will really be protected. Many agricultural zones are in effect holding areas for future development, with a long list of permitted uses that have nothing to do with farming.

- Federal money, local programs: The Farm and Ranch Land Protection Program (FRPP), authorized by the 2002 Farm Bill, is a joint federal-local program. Some goals are congressionally mandated and some are locally mandated. Funding is also a mix of federal and local—state, county or non-profit—money.
Accountability: Publicly funded programs to protect farmland generally incorporate the preferences of the general public and produce total benefits that exceed program costs. In an age of greater accountability for the use of public dollars, the pressure to meet this challenge will only increase.

Selection Criteria

Farmland preservation programs provide an assortment of benefits. Some current programs specify amenities to be protected, such as soil quality. Public program managers need acceptable program criteria and information on how potential parcels meet those criteria.

There is, however, considerable diversity in selection criteria exercised by the state agencies purchasing development rights. Soil quality is a criterion in all states but Utah and Montana. USDA’s Land Evaluation and Site Assessment (LESA) framework is the land selection criteria used in Delaware and several other states. Some states emphasize lands under direct pressure for non-farm development; others prefer lands that are neither remote nor under intense pressure.

Parcel size matters in some states, but not others. Proximity to other preserved farms also is an important criterion; it is a way to create large contiguous blocks of preserved land and minimize conflicts with non-farm neighbors.

Land contains attributes that have value, some of which are not reflected in the market place. For example, the attributes of farmland associated with agricultural productivity or development potential are likely to be captured in the price of land. But the value that farmland contributes to groundwater recharge in an area, wildlife habitat or scenic amenities is not likely to be included in the market price. When prices don’t capture the value of all attributes, there is a form of market failure, and private markets no longer provide efficient allocation of resources.

The challenge is quantifying public preferences for farmland amenities that are not reflected in market prices. Economists define the benefits from such things as scenic amenities and wildlife habitat as “public goods.” Identifying the most appropriate economic tool to use to estimate the value of public goods depends on the characteristics of the amenity or benefit being valued and its connection with real markets.

Participants in the Farm Foundation workshop (See box page 4) sought to identify economic indicators that would be useful to managers of farm and ranch land preservation programs charged with selecting parcels for preservation. The easiest to apply would be quantifiable indicators to rank parcels. But the consensus of workshop participants was that one nationwide parcel-ranking tool was impractical, primarily because of local variation in program goals and community preferences.

Economic research has the potential to help maximize social benefits per program dollar. How these valuations are used in parcel selection, or the weight given to each, is a matter of policy design.

Workshop participants identified important selection criteria for farm and ranch land preservation programs. They were not able to agree, however, on an order of priority. Economic analyses may produce tools that could help clarify these priorities. Here are the criteria identified:

Agricultural Productivity. Soil productivity needs to be part of all farmland protection priority schemes.

Sustainable Agricultural Economy. This criterion features information on farm viability, including the notion of a critical mass of farming activity, size of parcel, proximity to other preserved land, and economic returns to farming in the community. The management skill of the operator also is a factor. Indicators will differ by the type of farm. In many areas, viability will depend on the availability of off-farm employment.

Preserving Rural Heritage. Farming is part of the identity and character of many rural areas. This criterion may be aligned with “saving the family farm” and have greater importance in some programs than in others. In some farmland programs, protecting a century farm on marginal land may be more important than protecting more productive land. Measuring and weighting this criterion relative to others will be a matter for state or local debate, and is increasingly important to receive federal dollars.

Ecological Services. The capacity of various farmland parcels to generate or retain ecological functions varies in importance by state. Some work has been done on measuring the extent and value of these services.
**Growth Management.** Some program managers say the use of growth management as a rationale for farmland retention could kill a program. It can be a politically sensitive criterion for parcel acquisition. In other places, there is support for farmland preservation because it can direct growth away from important open lands.

**Scenic Amenities.** This attribute benefits significantly from economic measurement research. What attributes of farmland are valued by the public as part of rural scenery, which attributes are more important than others, and how much are they valued? Some economic analysis has been done to measure the extent and value of scenic amenities, but more is needed.

**Recreational Opportunities.** Many farms can offer people the chance to experience farming activities, pick apples, select a pumpkin or hunt. These farmer and non-farmer contacts improve understanding. The ability to offer such services might be considered in the framework for choosing parcels for protection.

**Fiscal Impacts.** There are costs and benefits to keep certain parcels in farming and out of the supply of developable land. What economic activity is gained? What is lost or transferred? How much will developing farmland cost a community to provide new residents with community services, such as schools, water and sewer lines? Workshop participants agreed the expected fiscal effects of permanently removing development potential should have a role in comparing parcels for protection.

**Proximity to Other Protected Land.** Many programs emphasize protecting large areas of farmland to sustain an active agricultural industry in an area. Location of a parcel relative to farmland already protected, or open lands protected for other purposes, is a critical component of any decision framework.

**Summary**

Increasing interest in farm and ranch land preservation programs requires the development of sound tools to maximize the effectiveness and efficiency of these programs. The three basic tools policymakers currently use to preserve farm and ranch land—taxation, regulation and spending—each carry benefits and shortcomings. Issues of debate are coordination of local, state and federal programs; the fairness and effectiveness of program design options; the challenge of blending local and congressionally mandated goals in programs that also mix local and federal funding; and accountability for the expenditure of public funds.

A critical issue is what criteria to use in selecting land for preservation. The variability of preservation program goals makes it nearly impossible to identify selection standards with nationwide applicability. Economic analyses could yield tools to enhance the ability of program administrators to identify parcels that best fit program goals. Seven areas where economic research is needed are: valuation measurement; land-use dynamics; program design and outreach; operational issues; policy issues; and program performance.

**Resources**