Anyone considering an educational program about the role of natural resources in rural development must consider five points:

1. the definition or meaning of rural development,
2. the role of natural resources in rural development,
3. central issues relative to natural resources and rural development,
4. identity and characteristics of the audiences to which such programs are to be directed,
5. the methodology to be used in conducting an educational program.

Rural development may be defined as a focused effort to improve the well-being of rural residents. There is no single indicator of "well-being," although income and employment are two commonly used indicators. Stability of employment and income over time may be as important as the level of employment and income at any given time. Population growth, demographic mix, adequacy of public services, cost of living and environmental quality are all candidates for inclusion as indicators of well-being.

The role of natural resources in rural development has sometimes been viewed in terms of major public investments in natural resource development, such as the large multi-purpose projects of the Bureau of Reclamation. More generally, such basic industries as farming, fishing, forestry and mining are recognized as direct links between natural resources and rural economic development. Increasingly, natural environmental systems have come to be recognized for their importance to the quality of rural community life.

Issues in the role of natural resources for rural development can be grouped. Some relate to the performance of those natural-re-
source-based industries upon which many rural communities are solely dependent. Some of these industries have been declining industries in the sense that technology has reduced the need for labor and thus has reduced the number of jobs. Another group of issues relate to problems faced by rural communities experiencing rapid growth or those affected by rapid growth in nearby areas. In these instances, the problems usually are not related to lack of economic opportunity but to the stress on public services, public infrastructure and environmental quality from rapid economic and population growth.

Some argue that the most difficult challenge for communities experiencing rapid growth is to deal effectively with what economists call negative "externalities"—those adverse off-site impacts of new development that are borne by third parties. Examples include traffic congestion, noise, air pollution, water pollution, loss of attractive natural settings and loss of open space. An inherent difficulty in dealing with negative externalities is that the benefits of development often accrue initially to a relatively concentrated group of well-organized investors, speculators and property owners while the adverse "spillover" effects are borne by a large population having no direct interest in the development and no organized method of representing their diffuse interest in development decisions. How can these diffuse interests be represented in development decisions?

However, the issues surrounding trade-offs between environmental quality and development give rise to emotional disputes over the meaning of private property rights. To the extent that environmental groups have been able to bring environmental quality into the agenda for development decisions, owners of property have found their options for economic development to be constrained, and, in some cases, eliminated. In some instances, developers and property owners have complained that environmental interests have been advanced in ways that are capricious or unnecessarily burdensome to those who have invested heavily in projects that were intended to be environmentally sound.

Given the important, but controversial, nature of the issues, extension education should not proceed from the presumption that technical "solutions" exist. Rather, two helpful roles may be available for the extension professional. One may be that of process facilitator—one who helps contending factions explore constructive ways to resolve differences and arrive at mutually approved procedures and courses of action. The other role is that of public policy educator, helping all interested parties to achieve a more complete perspective on different perceptions of the issues, identifying alternative options for public policy, and exploring the implications of each policy option for all the stakeholders. The public policy education process might also include leadership development and workshops on policy making processes and public participation in policy making. Such work
may be viewed as "enabling" in nature—geared toward helping those interested parties who are unfamiliar with the policy making process be more effective in advancing their interests through that process. As always, the public policy educator must walk a fine line in terms of objectivity and neutrality.

The philosophical basis for this type of public policy education must be a commitment to pluralism in politics and to informed political decision making. Vested political interests will certainly not consider a commitment to pluralism as a "neutral" stance. This poses difficult problems for the extension educator. In some instances, the politics of legislative appropriations for extension programs may feature dependence on lobbying efforts by well-organized commercial agricultural interests. Consequences for extension policy educators may be two-fold: 1) they may be viewed by environmentalists as apologists for commercial agriculture and thus lacking in credibility, 2) they may be viewed by commercial agricultural interests as obligated to defend, against the claims of detractors, landowner positions on property rights and environmental regulations.

While the "tried-and-true" methods for public policy education help to identify the complexity of the educator's role, the concept of public policy education is not widely understood. Establishing credibility with colleagues within the university and the extension service is often as difficult as any task confronting the public policy educator. Once achieved, however, educational programs benefit from the willingness of faculty from the production departments, for example, to consider technical aspects of agriculture from a public policy perspective.

Extension educators may need to do a better job of helping traditional extension clientele anticipate the changes that rapid growth will make in a community and to anticipate the consequences of those changes for various interests within the community. To the extent that growth and change are inevitable, individuals would benefit from an opportunity to consider ways to ease the necessary transitions, from an individual as well as community standpoint.

The relationship of natural resources to rural development includes the role of natural resource and environmental policy on rural development objectives. Regulations pertaining to pesticides, surface mining, air quality and water quality generally serve environmental objectives. However, they may have unanticipated implications for the well-being of rural communities. A major issue in the development of comprehensive rural development policy is the difficulty of coordinating natural resource, environmental and rural development policy.