

I. AN INTEREST RATE POLICY FOR USE IN FEDERAL AGENCIES

A. THE COMMON SENSE OF DISCOUNTING

In evaluating investment opportunities open to the government, we attempt to project both their costs and their benefits several years into the future and to determine which investments to undertake. We may, for example, determine those projects for which the value of the benefits exceeds the cost over some appropriate period of time. Or, if we are comparing alternative ways of achieving some specified objective, we may seek the alternative which satisfies the objective for the lowest total cost. In either case, the question is, should we assign the same weight to a dollar of cost or benefit no matter when it occurs?

Economists unanimously answer no for a relatively straightforward reason. For the government to invest, it must obtain the necessary resources from the private economy, either from those who would otherwise consume them or from those who would otherwise invest them on their own behalf. Private consumers and investors are far from indifferent about when they must give up resources to the government. If resources he would otherwise use are transferred to the government, the private investor foregoes the opportunity of earning a rate of return which, in today's economy, ranges from 10 to 20 percent before taxes. The consumer must give up consumption opportunities. Though we can't measure the value of these opportunities directly, we can observe that consumers who pass up opportunities to invest in interest-earning assets, the lowest and safest of which now yield about 5 percent, must value today's consumption at least as highly as the future interest returns they are passing up.

For both investors and consumers, therefore, giving up a dollar today means giving up both the dollar and the interest return (implicit or explicit) it will bring. If the day of reckoning with the government can be postponed, interest can be earned or consumption enjoyed for at least a while so that when the government's claim for a dollar comes in, something of value—the interest that has accrued—will remain in private hands. To the private sector, therefore, today's dollar is more painful to give up and today's benefits are more valuable than tomorrow's costs and benefits. They should be assigned a greater weight in the government's analyses to reflect the value of the consumption and investment opportunities that the private sector must give up.

Thus, the common sense of using an interest rate concept in government investment decisions is this: the government should obtain a rate of return on its investments at least as large as the value of the consumption and investment opportunities private citizens must give up. Therefore, the government should assess itself an interest charge on the funds it needs that is equal to the opportunity cost of these funds to private consumers and investors. Returns to government investments should be large enough to cover both principal and interest. If the government ignores these opportunity costs and undertakes projects with relatively low rates of return, then society as a whole—public and private—is not receiving the maximum attainable value from its resources; the general welfare will be lower than it could be.

In fact, government agencies should deliberately design their investment projects with their rate of return in mind. Establishing and enforcing appropriate discounting procedures should not only lead to wiser investment decisions but encourage the design and development of better investment projects as well. For example, new defense weapon systems typically involve very heavy outlays in early years but reduced operating costs later on. By pointing out early in the process of reviewing and analyzing a proposed system that tomorrow's savings have less weight than today's cost, we hope to encourage system designers to insure that today's outlays produce the largest possible potential savings and to forgo expensive design frills with little or no payoff.

This line of reasoning should form the basis for the government's discount rate policy. But to say this is far from settling the matter. A large number of issues must be resolved in defining and measuring opportunity cost and in coming up with practical guidelines for policy. These issues have produced most of the debate that has taken place among economists on the question of the "right" discount rate.¹ I would like to review briefly some of these issues

¹ Some economists have argued that an appropriate discount rate is the social rate of time preference. According to this argument, private time preference, that is the strength of the individual consumer's preference for consumption today versus consumption tomorrow, is shortsighted. The government, representing society, should adjust its rate