programs for the indigent. In early retirement and in almost all relief programs, earning income reduces the amount of the payment from the Government. This provides an incentive against working which may lead to large social losses, especially in the case of younger people on relief. The effect is easily eliminated in the old-age case: part of the pension can be postponed until actual retirement and then increased over the usual amount to compensate the working old person for the earlier loss. In the case of relief payments, the solution is not so easy. Some work has been done on the possibility of incorporating relief and other payments into the tax system (with negative income taxes being "paid" by some), and this holds a great deal of promise for solving this problem.³

5. Costs of Market and Social Insurance

In the perfect market, as shown above, neither the form of insurance payments nor the timing will affect the rational consumer at all as long as the market value ⁴ of his lifetime income is not affected. This theorem depends, however, on the assumption that goods and services can be resold, and that all market transactions are costless. In fact, however, market transactions are not costless, and if the Government tries to minimize these costs, it will find itself providing insurance, and may find itself making payments in kind, when it wants to change the distribution of income. If people do buy insurance for old age, disability, sickness, and so on, Government transfers should (at least in part) be provided in transfers to the old, disabled, and sick. Furthermore, if most sick and disabled people want to purchase medical care, and if purchases of medical care have real costs (purchasers' as well as administration costs), medical care should be provided directly if these costs can be substantially reduced without affecting quality.

6. Uncertainty About Prices

The optimality theorems discussed in section 2 assume that all future prices are known. If they are not, then the appropriate way to provide general insurance for old age is to provide a real income; that is, to adjust the benefits year by year for changes in the consumer price level. This is now being done by the Canada pension plan. A companion policy to that one would be provision of Government bonds in real terms. These would be of direct benefit to savers who want insurance against inflation, and to the private insurance market which could offer many contacts in real terms.

Medical care provided by insurance (rather than cash payments in the event of sickness) is also required by these considerations. Medical prices may change independently of general prices, and consequently, a good way to provide sickness insurance in real terms is to provide either the care itself or to guarantee payment (whatever it is) for the necessary care.

⁵ See reference 5.

⁴ When dealing with lifetime income in an uncertain world, it is necessary to use a slightly different concept of lifetime income. Normally we use present value, but in uncertain conditions, uncertain incomes are converted to a present value by using prices of insurance contracts instead of simple bonds.