

WORKER VALUATION OF PENSIONS

Assume that the worker has a utility function that depends only on present values of wages and pension costs of employers.¹⁴ Assume also that the pension contributions on behalf of the worker are held by the pension fund. In the event that the worker leaves employment, the funds are forfeited to the fund and reduce the employer's contributions on behalf of other workers.¹⁵

The worker's utility function is

$$U = U(W, P) \quad (2)$$

This function assumes that the worker does not evaluate pension benefits in terms of present values, but knows how much the employer will contribute for his pension. Assume $\partial U / \partial W > 0$ and $\partial U / \partial P > 0$. If the worker attaches no value at all to pensions ($\partial U / \partial P = 0$) the situation is that of indifference curve 1 in figure 3. If $dW/dP = (\partial U / \partial P) / (\partial U / \partial W) > -1$, the situation is that of indifference curve 2. This implies that the worker attaches some value to pensions, but he would prefer a dollar of wages to a dollar of pension costs.¹⁶

The third possibility, $dW/dP < -1$, implies that the worker prefers a dollar in pension costs to a dollar in wages.¹⁷ This is shown in indiffer-

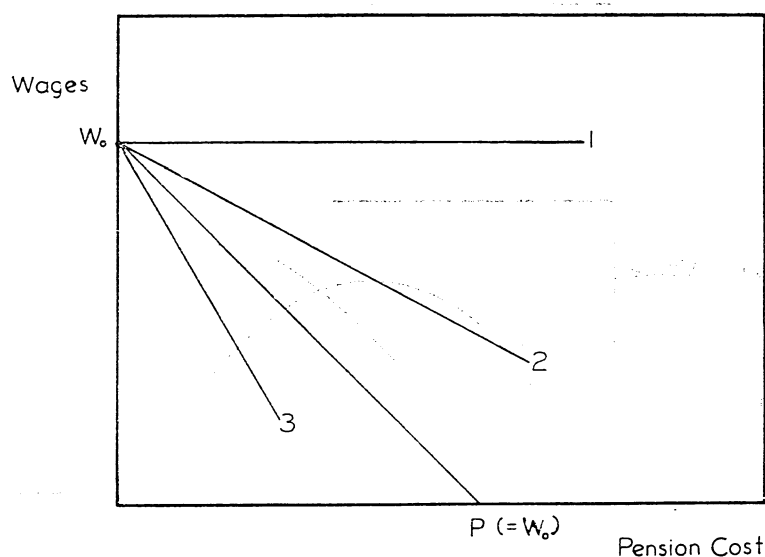


Figure 3

¹⁴ For simplicity, pension costs are used instead of the pension plans available to the worker. This assumes the worker or employer must choose what kind of pension is to be adopted.

¹⁵ Federal regulations provide that forfeited pension credits can only be used to reduce employer contributions. This is in most instances identical in effect with this assumption made in the text.

¹⁶ Curves 2 and 3 are not necessarily linear.

¹⁷ This is essentially the assumption made by G. Rimlinger, "A Theoretical Integration of Wages and Social Insurance," *Quarterly Journal of Economics*, August 1963, pp. 470-484. Rimlinger unrealistically assumes that the worker prefers pensions to wages but cannot defer earnings except through collective action, thus assuming away all annuities and reserve life insurance.