

The Embeddedness of Depression in the Simple Keynesian Model

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Abstract

The sole objective of this very short paper was to disclose that depression is ingrained in the simple Keynesian model of hydraulic Keynesianism. Depression occurs in the Simple Keynesian Model because of the fact that the rate of change (growth) of saving is greater than the rate of change (growth) of investment. Depression can be cured, or prosperity can be realized if the rate of change (growth) of saving is equal to or less than the rate of change (growth) of investment.

Keywords : Keynesianism, consumption, saving, investment, stability

JEL Classification Codes : E12, E21, E32, E63

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The sole objective of this very short paper is to disclose that depression is ingrained in the simple Keynesian model of hydraulic Keynesianism, coined by Alan Coddington (1976, 1983). It is noteworthy that the other two types of Keynesianism are (a) fundamentalist Keynesianism and (b) disequilibrium Keynesianism or reconstituted reductionism. Further, it can be pointed out that the other three variants of hydraulic Keynesianism are : (a) special Keynesian model, (b) IS-LM Keynesian model or more general Keynesian model, and (c) generalized or complete Keynesian model.

Hydraulic Keynesianism was devised by Hicks (1937), Meade (1937), Samuelson (1939a, 1939b, 1946, 1947, 1948), Harrod (1937), Hansen (1936a, 1936b, 1938, 1941, 1947, 1951, 1953), Smith (1956), and so forth.

The simple Keynesian model is based on the following three equations, which have been translated into Figure 1.

$$(1) S = S_a + S(Y) \text{ such that } S_a < 0 \text{ and } 1 > S'(Y) = MPS > 0$$

$$(2) I = I_a + I(Y) \text{ such that } I_a > 0 \text{ and } 0 < I'(Y) = MPI < S'(Y) = MPS$$

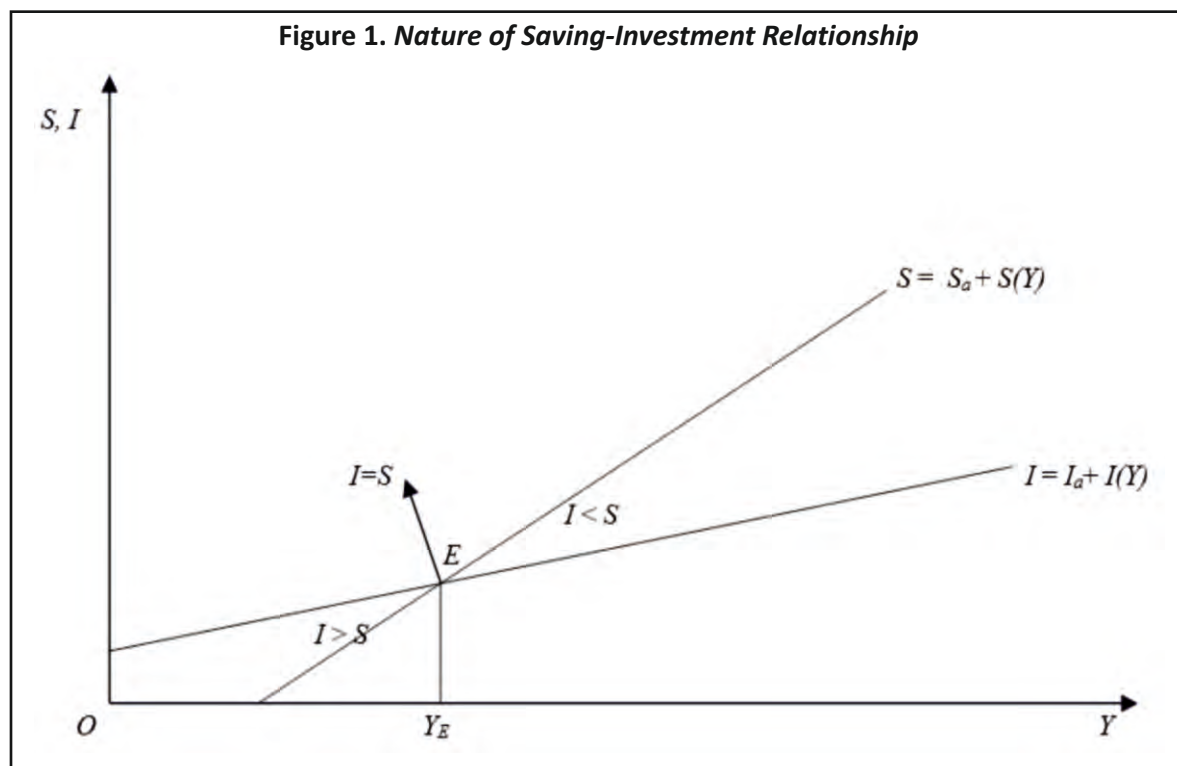
where,

$MPS \equiv$ marginal propensity to save (slope of saving function) and $MPI \equiv$ marginal propensity to invest (slope of investment function).

$$(3) S = I \text{ (equilibrium condition of commodity market)}$$

The point elasticity of S with respect to Y of the S function $= E_{SY} = (dS/S)/(dY/Y) = (dS/dY)/(S/Y) = S'(Y)/(S/Y) = MPS/APS > 1$, since $MPS > APS$, where $APS = S/Y$. So, $E_{SY} > 1$, which means that $dS/S > dY/Y$. This implies that the rate of change (growth) of saving is greater than the rate of change (growth) of income.

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On the other hand, the point elasticity of I with respect to Y of the I function $= E_{IY} = (dI/I)/(dY/Y) = (dI/dY)/(I/Y) = I'(Y)/(I/Y) = MPI/API < 1$, since $MPI < API$, where $API = I/Y$. So, $E_{IY} < 1$, which means that $dI/I < dY/Y$. This implies that the rate of change (growth) of investment is less than the rate of change (growth) of income.

Thus, at the point of equilibrium denoted by E in Figure 1, though $S = I$ and $MPS > MPI$, yet we have: $E_{sy} > E_{IY}$, which means $dS/S > dI/I$, that is, the rate of change (growth) of saving is greater than the rate of change (growth) of investment, which is the vital condition of depression. Hence, in the developed capitalist economy, depression is inevitable owing to the fact that $MPS > MPI$ and $dS/S > dI/I$. Depression can be cured, or prosperity can be realized if $dS/S = dI/I$, which is the condition of stability, and it implies that the rate of change (growth) of saving is equal to the rate of change (growth) of investment or, $dS/S < dI/I$, which is the condition of prosperity and it implies that the rate of change (growth) of saving is less than the rate of change (growth) of investment.

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Dr. Arup Kanti Konar has acquired his Ph.D degree from IGNOU, New Delhi. His research interests and publications are not confined to the economics discipline only. He is the Principal and Associate Professor of Economics of Achhruram Memorial College, Jhalda, Purulia, West Bengal. He is a member of the editorial board of more than seven national and international journals.