

# The Hicks-Malinvaud average period of production and 'marginal productivity': a critical assessment

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## **Abstract:**

Malinvaud took up the concept of the average period of production introduced by Hicks, in *Value and Capital* and then *Capital and Time*, in an article of 2003 celebrating Wicksell's contribution to the theory of capital, where he observed that once techniques are ranked according to the average period for a given initial rate of interest, a rise in the rate of interest entails the use of a technique with a shorter average period.

After a brief reconstruction of Malinvaud's argument, it is shown that the result is far less encouraging for neoclassical theory than it might seem. The most important problem is not the fact that change in the interest rate affects the average period of production associated with a technique, despite the concern this aroused in Hicks and Malinvaud, but rather that it affects the ranking of techniques. An example with two techniques is used to show that a rise in the rate of interest entails the use of a technique with a shorter average period even in the case of reswitching simply because the ranking of techniques is inverted at the two switch points.