
Comments

Assessing target zone credibility: Mean reversion and devaluation expectations in the ERM 1979–1982

by Lars E.O. Svensson

Kenneth Rogoff

Princeton University, Princeton NJ, USA

This superbly-crafted paper represents the culmination of a long (and
theoretically fascinating) journey through the intricacies of target zone exchange rate models. Svensson argues that in practice the elegant S-shapes of the target zone models are not that important empirically. Instead, he offers a couple of simple approaches to estimating market expectations of intra-band movements, and shows how one can use these approaches to extract realignment expectations from interest differentials. This achievement is certainly modest compared to the early welfare-theoretic aspirations of the target zone literature, but it is nevertheless a very concrete and important one.

My main comment is just a simple note of caution that a low expected rate realignment does not necessarily imply that market participants are confident of the stability of the current exchange rate band. Svensson's estimates of various currencies' expected rate of realignment vis-à-vis the DM only correspond to expected mean absolute realignments if one assumes that the DM will never be devalued. Without this assumption, it is perfectly possible to have enormous uncertainty about the future band position without having a large interest differential.¹

To be concrete, suppose that the ten-year interest differential for the DM against the franc were literally zero. (For long-term differentials the fact that exchange rates can move a few percent within the band is a very minor issue; when amortized over long periods, expectations of intra-band movements are at most a trivial component of long-term interest differentials.) Does the fact that the long-term differential is zero mean that the band is completely credible? Clearly this need not be the case. It is perfectly possible that market participants think there is, say, a 25% chance of a 25% franc devaluation against the DM, and an offsetting 25% chance of a 25% DM devaluation against the franc. That is, the credibility of the band may be quite low at the same time the interest differential is negligible.

In the early years of the EMS, this issue was probably largely academic but it is not obvious that this is the case today, especially when the problem is viewed over long (ten-year) horizons. Unification has significantly changed fiscal and monetary pressures in Germany for many years to come. To extract information on mean absolute devaluation, one would need measures of expected volatility. (Option prices offer one piece of information on volatility, though these are generally only available for relatively short horizons.)

If it appears that I am quibbling, perhaps it is because it is difficult to find serious fault in Svensson’s methodology. The most obvious criticisms involve

¹The point I am making here holds even if the exchange rate is currently in the center of the band. If the exchange rate is on the edge of the band then one would expect mean reversion in the absence of a realignment. In other words, when the exchange rate is on the edge of the band, one would expect a significant short-term interest differential unless there are expectations of a devaluation.
asking the author to enrich the model to incorporate risk, target zone nonlinearities, etc. But Svensson not only notes these issues, he has explored many of them thoroughly in papers elsewhere.

One problem the paper does not overcome is the narrow positive focus of target zone exchange rate research. Target zone models have succeeded in improving our ability to model exchange rate expectations, but have not really proven useful in helping explain exchange rates in terms of fundamentals. The fact that they do not incorporate any type of price rigidity makes them both patently unrealistic and of little use in analyzing the welfare effects of alternative intervention rules. Nevertheless, Svenssons' paper shows that target zone models can yield some important practical results.