## Keep your old dimes safe

As a child I was told by my grandfather to keep an eye out for old dimes and to keep them because while dimes minted before 1967 were 80% silver, dimes minted from 1968 onwards were 99.9% nickel. While both dimes had the same denominational value – ten cents - the silver dimes had a greater intrinsic value as silver is a more valuable metal than nickel. Predictably, the silver dimes quickly disappeared from circulation as people kept them.

The fate of silver dimes illustrates Gresham's Law, which states that bad money drives out good. Put another way, if there are two sorts of money in circulation with identical denominational value but different intrinsic value, people will hold onto the money with the higher intrinsic value while spending the money with the lower intrinsic value.

While no money in circulation anywhere in the world has intrinsic metallic value anymore, the bank runs in Greece this month also illustrate the principle implied by Gresham's Law: given a choice, people will hold onto money likely to keep its value and spend or otherwise rid themselves of money likely to lose it. As Greece came ever-nearer to insolvency ordinary Greeks, aware that euro banknotes were more likely to keep their purchasing power than bank deposits subject to confiscation or revaluation into drachma, withdrew billions of euro notes from their bank accounts.

The 2008 financial crisis also illustrated this principal, but with credit. Credit behaves a lot like money most of the time. Just like money, we can use credit to buy goods and services and are happy to extend credit to buyers who we feel will be able to settle their bills. Further, so long as we have confidence in people's ability to pay their bills, we are also happy to store our wealth in the form of credit notes such as bonds.

Credit crises occur when this confidence in the ability of others to settle their bills evaporates and credit and money are consequently viewed very differently. In such crises, people rush to exchange credit notes which they fear may become worthless for cash which they feel will retain its value. In 2008 it became obvious to some that many of the mortgage-backed bonds that had been packaged and sold by the major investment banks were worthless. Realizing this, people who held mortgage-backed securities rushed to exchange them for cash. As the pace of selling increased the value of the bonds collapsed. This fall in prices threatened to push those banks still holding bonds into bankruptcy. Consequently the banks, unsure of each other's financial viability, stopped lending money to one another and began hoarding what cash they had in order to cover their own anticipated losses.

In the real economy, meanwhile, as banks stopped extending credit many businesses found themselves unable to purchase the materials they needed to operate. As operations slowed, firms began to lay off workers. As these workers saw their incomes fall they in turn cut their household spending. Soon the entire economy was caught up in a deepening recession as production, incomes and spending went into a self-reinforcing free-fall.

In order to arrest this destructive spiral, in 2008 central banks around the world agreed to buy mortgage bonds and other worthless assets from the banks at full face value using newly created

money. In the very short term, this restored confidence and got the credit markets moving again. A catastrophic depression had been narrowly averted.

However, once the immediate crisis abated, the difficult task of assessing credit quality and booking losses was never faced. Rather than raising interest rates and tightening credit standards, governments and central banks have engaged in round after round of money printing and bond purchases in order to keep credit plentiful at extraordinarily low interest rates. This has allowed the bad bonds that caused the crisis to remain on bank balance sheets and has permitted many banks which are in fact bankrupt, given that these assets are worthless, to remain in business.

In the past, countries which engaged in such excessive money printing and interest rate suppression have seen the value of their currencies collapse in the foreign exchange market. Savers, anxious to preserve the value of their savings, have sold their pesos and drachma in order to buy hard currency in another example of Gresham's Law in action. However, as today these destructive monetary policies are being implemented by all of the world's central banks in concert, there are no hard currencies left for savers to turn to.

Thus, the world's savers are now faced with a very unappealing set of choices. On the one hand, they can avoid low interest rates by investing in risky stocks and derivatives. On the other hand, they can choose to forego the zero percent interest offered for their savings and withdraw from the banking system entirely by converting their bank balances into banknotes.

Knowing that people may be inclined to choose the latter, in April Willem Buiter of Citibank proposed *abolishing physical currency altogether* in order to make it possible for the banks to implement *negative* interest rates on savings.

With negative interest rates, depositors would *pay* banks for the privilege of having them hold their money. As people would undoubtedly prefer to hold banknotes in order to avoid such skimming, the banks wish to eliminate them as an alternative. In essence, they are attempting to abrogate Gresham's law. Having eliminated money with intrinsic metallic value in the 1960s, they now wish to eliminate paper money as well. Bankers like Buiter are assuming that if they can make good money unavailable people will be forced to use *and hold* (and, through negative interest rates, lose) the bad money created from nothing but keystrokes on their banks' computers.

This, though, is a very dangerous game. If the only money available is bad money designed by the banks to steal people's savings we should not be surprised if people choose to cash out and store their wealth in other ways. There is evidence that this is already happening. In Greece last month the number of new car registrations hit a record as people transformed the money in their savings accounts into metal, rubber and glass. In New York, meanwhile, a single Picasso painting sold for a mind-boggling \$179 million as someone exchanged his or her savings for canvas and oils. High-end real estate prices are similarly crazy. In Monaco a developer is offering a penthouse apartment with a price tag of \$400 million.

The crisis of 2008 was caused by too-rapid credit growth (much of it 'bad credit') and was only contained with the help of extraordinary monetary growth. However, by keeping the money

spigots wide open in order to avoid the losses and bankruptcies that are a necessary part of cleaning up after a credit crisis, the banks are turning money bad as well, thereby transforming a serious credit crisis into a potentially catastrophic monetary crisis.

The low, zero and now negative interest rates that the banks require to avoid bankruptcy are turning money held on deposit into an unattractive store of wealth. It the banks get their way and abolish physical currency as an alternative people may lose confidence in money altogether. If this happens, the rush to exchange increasingly worthless bank balances for anything tangible with intrinsic value will set us firmly on the road to hyperinflation. Our entire economy, and not just our credit markets, will cease to function as people revert to barter trade for even simple transactions. Most alarmingly, while previous episodes of hyperinflation have been limited to single countries (Weimar Germany, Yugoslavia, Zimbabwe), the hyperinflation that is coming will be global in scope and may therefore pose an existential threat to our entire civilization.

In the aftermath of such a disaster, the only money anyone will trust will be money with some sort of intrinsic value. If you still have old dimes in a jar somewhere, be sure to keep them safe.