

Ride the Wave

By Maury Seldin*

Stay with me, I shouted, as the current pulled me out to sea. The shout was to another body surfer on the west beach in Hawaii.

That was many years ago. Taking a break from CRE meetings, I visited with an old friend from California, then residing in Hawaii. Naturally, we went body surfing. That's what Californians do. However, I was unfamiliar with the Hawaiian currents. Growing up in Los Angeles, my early experience was with the Pacific Ocean's moderate surf. There were rip tides, true, but I could walk ashore. At this beach in Hawaii, the land dropped off precipitously so that it didn't take much to get me in over my head.

The experienced local surfer, who accompanied me in my swim back to shore, mentioned that I should have picked a fixed point on land to watch so that I could tell if the current was pulling me sideways. I agreed. That added substantially to my knowledge of currents.

More recently, I have been adding to my knowledge of chaos theory. Probably substantially, since the base is what I had picked up in conversation, and the addition is what is learned from reading the book by James Gleick, titled Chaos: Making a New Science.

An excellent example to convey the salient concept of a chaotic system is the Lorenzian Waterwheel. Water pours in from the top at a steady rate. [The buckets in the waterwheel have holes in them resulting in a loss of water dripping through the holes.] If the flow of water [to the bucket at the top of the wheel]...is slow, the top bucket never fills up enough to overcome friction, and the wheel never starts turning. If the flow is faster, the weight of the top bucket starts the wheel in motion. The waterwheel can settle into a rotation that continues at a steady rate. But, if the flow is faster still, the spin can become chaotic, because of the nonlinear effects built into the system. As buckets pass under the flowing water, how much they fill depends on the speed of spin. If the wheel is spinning rapidly, the buckets have little time to fill up. Also if the wheel is spinning rapidly, buckets can start up the other side before they have time to empty. As a result, heavy buckets on the side moving upward can cause the spin to slow down and then reverse. In fact, Lorenz discovered, over long periods, the spin can reverse itself many times, never settling down to a steady rate and never repeating itself in a predictable pattern. [p.27]

This lack of predictability is present in forecasting currents and tides, and even more so in forecasting weather. The extent of nonperiodic flows in a physical system significantly affect the predictability. The periodicity of the forces affecting tides is greater than the periodicity of forces affecting weather, hence the difference in predictability.

As we talk of periodicity and predictability, fuzzy thinking comes to mind. We are accustomed to digitizing the variables because we process data mathematically.

According to Albert Einstein, "As far as the laws of mathematics refer to reality, they are not certain. And so far as they are certain, they do not refer to reality." [Quoted by Kosko, p3]

Kosko, in his book Fuzzy Thinking: The New Science of Fuzzy Logic develops the idea that I would describe by saying not all variables are digital, many are analog. Thus, attempting to quantify and classify produces a problem of some deviation from reality. Sometimes it is trivial. But, sometimes it is significant enough to affect predictability.

Having just come from a philosophy class discussing Camus= The Stranger, I am mindful that not everyone sees things the same way. The existential thinking, as best as I have been able to figure out, is that we have some control over our lives, and that our actions are derived from passion as well as reason. Many of you may not have bought into that - you still believe in the economic man of Adam Smith. News flash! Behavioral economics and behavioral finance are here. They may not have arrived, but they are here so that we may consider that the decision making of the relevant populace is not predictable solely upon the econometrics of economic behavior.

Aside from changing economic structures associated with societal change, impeding the accuracy of forecasts based on previous structure, there are changes in players and attitudes that may severely limit the relevance of relationships revealed by the historic data. The relevant relationships may require that the focus of scale be finer than one is accustomed to. That is, if we are looking at flow of funds, for example, the analyses requires segmentation of the decision-making populations into clusters with different behaviors and some analysis of the behavior.

We may not have sufficient theory in our respective disciplines to deal with the issues. However, an inter-disciplinary effort may produce a sufficient beginning of a theory to get a significant point of departure. As a step towards an intermediate solution, I have written in internal documents, "In the present case, as noted in the June 4 memo, >[t]he key to the analyses is that some sources of funds may consistently be early movers. Others may be consistent laggards. And, some may be those that push the prices well beyond sustainable levels. The thesis is that there are some investors who consistently behave as value investors moving in when REITs as a group are undervalued, others are momentum investors who go with the flow, and there are others who don't go with the hard numbers but rather with the irrational exuberance, or tea leaves, or whatever. While we don't know enough about the specifics of the behavior, we may be able to identify the groups that lead the pack. That identification is the task, as is constructing the series that will give the early signals."

My preference is to get some more research funding so as to be able to induce colleagues and potential colleagues to focus on an area that has the potential for a significant contribution in improving the quality of real estate decision making. In this case, the decision-making relates to the flow of investment funds to real estate, especially securitized real estate such as REITs.

Kosko, the author of the book Fuzzy Thinking, referred to earlier, writes, "Science prefers small steps to large creative leaps." He goes on to say, "My fuzzy work and fight also taught me a hard fact: science differs from scientists. The product of science is knowledge. The product of scientists is reputation." That may be true for some scientists, but, for others there is the "Aah ha!", the joy of discovery, the exhilaration of riding the wave.

There is a wave to be ridden here. There are lots of roles. It is a team effort. Come ride the wave.