

**Ms. Phillips reassesses the stock market crash of 1987 in the context of subsequent market and regulatory changes** Remarks by Ms. Susan M. Phillips, a member of the Board of Governors of the US Federal Reserve System, at Bentley College, Waltham, Massachusetts on 15/10/97.

### Black Monday: 10 Years Later

Thank you for inviting me to participate in this program sponsored by the Financial Women's Association. We are drawing very close to the tenth anniversary of the stock market crash. It is useful to reassess that event in the context of subsequent market and regulatory changes. The crash was one of those (fortunately rare) events that serve as a watershed for our discussion of markets and public policies. Considerations of regulatory approaches now almost always use the crash as a reference point. Panels such as this one provide a vehicle for evaluating not only what we have learned from the event but also the various actions taken following the crash. But it is also appropriate to look forward. Changes in financial markets and the risk management capability of firms have been significant in the intervening years. The crash may no longer be as useful a reference point for judging events and evaluating public policy responses.

I suppose everyone can remember what they were doing on the day of the crash. I had the good fortune to have left the CFTC prior to the crash. Thus, I got to watch events unfold from the cornfields of Iowa. Later, however, I participated in several post-crash evaluations. Even now, at the Federal Reserve Board, the crash periodically comes up in supervisory discussions about bank risk. (Regrettably, the crash is now part of a pantheon of financial market "problems" that include Barings, Daiwa, Metallgesellschaft, Orange County, and Sumitomo.)

### The Legacy of the Crash

The legacy of the crash is both tangible and intangible. An impressive number of studies of the crash were done. The more noteworthy ones take up about three linear feet on my bookshelf, a very tangible reminder. More seriously, the studies done after the crash were wide-ranging and examined events through the eyes of many different market participants, many different regulators, and a host of academicians. They identified weaknesses in trading and clearing systems that have resulted in tangible changes to those systems. These changes have been very positive. Exchanges have greatly expanded their ability to handle surges in volume, for example. The capitalization of market makers has been bolstered as well.

Numerous changes also have been implemented in clearing systems. Doubts that emerged about the soundness of clearing systems were some of the most frightening aspects of the crash. The changes to clearing systems have received far less attention than those to trading systems, but their long-term consequences likely are more profound. Such critical parts of the "plumbing" as the agreements between the futures clearing houses and the settlement banks have been clarified and put on a much sounder footing. In addition, many clearing organizations have established back-up liquidity facilities that will enable them to make payments to clearing members in a timely fashion even if a clearing member has defaulted.

In both our evaluation of trading mechanisms and our evaluation of clearing systems, an important intangible outcome of the crash is that we now have a better understanding of the way these systems work. During ordinary trading days, market participants rarely if ever question counterparties' ability and willingness to perform on obligations. In the months following the crash, policy makers and market participants began to examine those payment conventions more closely. The bulk of the changes to risk management systems that flowed from the crash related to efforts to clarify or make more rigorous the responsibilities and obligations of market participants that previously had been left ambiguous or were part of the lore of "normal" market practice.

Another very important intangible legacy of the crash is our better understanding of the need for cooperation and coordination among commodity, securities, and banking market authorities. The crash vividly illustrated the extent to which markets are intertwined and the extent to which large financial firms have lines of business that cut across many markets. The forums for coordination are almost too numerous to mention, not least of which is the President's Working Group on Financial Markets. The Working Group comprises the heads of the Treasury, SEC, CFTC, and Federal Reserve, and in addition, other banking supervisory agencies, the National Economic Council, and the Council of Economic Advisers participate.

### Prospect

Looking forward, we are better positioned today to absorb market shocks than we were prior to the 1987 crash. We undoubtedly, however, will have many different problems in future periods of volatility. Responses to events such as the 1987 crash tend to be crisis-specific. One of our challenges is to make public policy responsive to changing market conditions rather than let it be driven solely by the most recent crisis. The circuit breakers put in place after the crash offer an interesting example of this phenomenon.

Circuit breakers are trading halts coordinated across the equity and equity derivatives markets. They were first suggested by the Brady Task Force, and they are one of the more notable recommendations of that report. As stated in the report, the purpose of this (and the other recommendations) was “[t]o help prevent a repetition of the events of mid-October and to provide an effective and coordinated response in the face of market disorder.”

Circuit breakers are widely cited today as one of the successes of the crash post-mortems. But I, for one, question this evaluation. Circuit breakers have never actually been triggered, in contrast to some of the so-called “speed bumps” which affect particular trading strategies and are now tripped routinely. (In contrast to circuit breakers, which are coordinated across the equity and derivative markets, speed bumps are trading restrictions that have been put in place by individual market places.) If circuit breakers have never been used to halt trading, it follows that we have never had the experience of trying to re-start trading either. To an economist such as myself, some of the scariest times during the market crash were those in which trading was not occurring. Our tendency to worry more about stopping trading than re-starting it is mystifying. (I realize that there has been some discussion about the rules for the resumption of trading but the overwhelming attention has been on the halt.)

Recent re-assessments of circuit breakers have focused on increasing the magnitude of price declines necessary to trigger coordinated trading halts. If we are going to continue having circuit breakers, I am supportive of this action and feel that a periodic evaluation of circuit breakers is valuable to ensure that trading halts only occur during very unusual market conditions. Nonetheless, I think that we also should broadly re-evaluate circuit breakers in light of current market conditions. Are circuit breakers fulfilling the goal articulated by the Brady Task Force of providing an effective and coordinated response in the face of market disorder? Do circuit breakers continue to be the best public policy response to market volatility?

Many features of financial markets have changed over the last ten years, not least of which is the continuing growth in international activity. Circuit breakers are much more difficult to impose when trading activity can move to markets that do not participate in the trading halt. As I noted earlier, one of my main concerns is the restarting of trading following a halt. If liquidity has moved to over-the-counter markets or foreign venues, how does one get that liquidity back in the domestic, exchange-traded market when the trading halt ends? What kinds of problems might domestic specialists and market makers have in restarting if the market has moved away from them during the halt? Recent changes to shorten the duration of the circuit breakers likely would ameliorate these concerns somewhat, but the worry remains.

Another important change in the financial landscape in the years since the crash has been a greater focus on risk management by both market participants and supervisors. Developments of new instruments, both on and off exchanges, and of new methods for evaluating risk, have given market participants powerful new tools to allow them to absorb market shocks. Similarly, risk management tools have been enhanced at clearing organizations.

Regulators must respond to these new tools. To fully utilize their benefits, regulators will need to approach regulation and supervision in different ways. A good example is to be found in the approach by banking supervisors to developing a capital requirement for market risk. After initial fits and starts, the Basle Supervisors' Committee embraced the concept of using banks' internal models as a basis for a capital requirement for market risk. The Federal Reserve has taken this process of employing new approaches to regulation a step further with its pre-commitment proposal. Pre-commitment allows banks to commit to the maximum loss they will experience over the next quarter in their trading portfolio; this commitment becomes their capital requirement. The proposal gives banks incentives to establish the commitment in a prudent fashion through fines and disclosures if it is violated. Economists in the audience will recognize this proposal as an application of an incentive-compatible approach to regulation.

I suspect that there are far more areas in our regulatory structure in which incentive-compatible approaches could be implemented. Self-regulatory organizations also may find such an approach beneficial, particularly in this era in which SROs are being asked to assume more and more regulatory responsibilities. Incentive-compatible regulation essentially tries to harness the self-interest of market participants to achieve broader public policy goals. By using such an approach, our overall goal is to make individual market participants more resilient and better able to withstand shocks. This, after all, is the most basic (and probably the most effective) protection for firms faced with events such as the 1987 crash.

At a macroeconomic level, public policies also should ensure that markets and the economy itself can withstand shocks. While the 1987 crash did not have significant, real economic effects, this is not always the case with stock market crashes. Such episodes are generally accompanied by dramatic increases in uncertainty and increased demands for liquidity and safety. Some of these demands for liquidity may, in turn, reflect the fear that the crisis will spread more broadly to the economy. In 1987, a key role played by the Federal Reserve was to demonstrate a determination to meet liquidity demands, and thereby to reassure market participants that problems would not spread beyond the financial system. Problems were contained in this instance, but policy makers cannot be complacent. In the lessons to be learned from the crash, we should not lose sight of the potential for financial crises to have real effects and of the on-going need for public policies to be directed toward mitigating these effects.