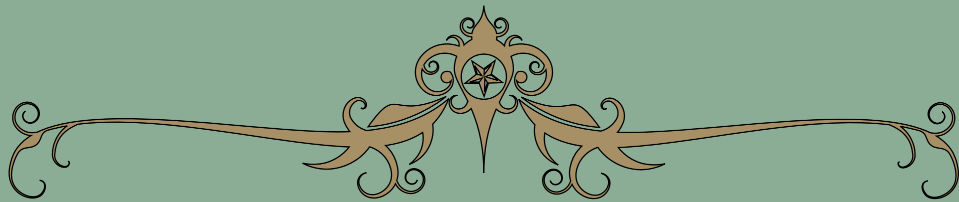
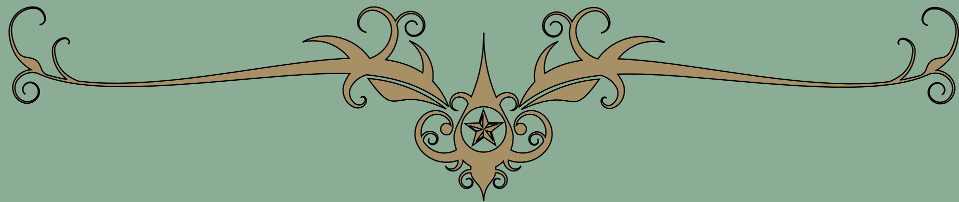


RISK TRANSMISSION



Scope

Risk transmission in the financial system involves the movement/assignment of risk from one entity to another, in return for a compensatory payment at a market-determined rate. In a well-functioning financial system, risk moves in an orderly manner between those who are originating it and those who are best placed to manage it, thus improving the overall capability to manage risk. The conference reviewed the existence and robustness of risk transfer mechanisms for individuals, firms and financial institutions in the Indian financial system.

Households are suppliers of risk when they are say, purchasing health insurance or borrowing, whereas they are demanding risk when they are buying equities and mutual funds. Households have to deal with significant shocks including bankruptcy if they don't manage these risks well, so the welfare implications are tremendous. Risk transmission is also critical at the level of institutions. A lender has to manage credit risk, operations risk and market risk. Credit risk, in turn, can arise from idiosyncratic factors like quality of under-writing and internal controls and systematic/external factors such as weather and business cycles. A life insurer has to manage actuarial risks and market risks.

IFMR Conference participants discussed in particular, the process in which risk transfers from originators (of financial services) to risk aggregators (financial institutions and capital markets). For instance, small financial institutions are vulnerable to weather risks that are unique to their area of operation and over which they have no control. In a well-functioning financial system, originators would be able to transfer such systemic risks to large, well-capitalised risk aggregators who by virtue of their diversification are much better placed to handle these types of risks. There was an important discussion around what types of risk must be retained and what must be transferred. It was noted that idiosyncratic risks that are internal to the originator (and very much in its control, such as credit risk arising from internal control and audit failures) must be retained by the originator in order to mitigate moral hazard. Systematic risks such as weather risks may be transferred (through insurance or derivatives) to entities with superior capabilities to manage the same. Orderly transmission of systematic risk is presumed to have a net welfare improvement for both counter-parties.

There are a number of obstacles in creating well-functioning risk transmission markets, such as the inability of counterparties to understand and price risks, flawed financial instrument design, information asymmetries between counter-parties (especially the issue of moral hazard) and legal/regulatory bottlenecks. Creating a well-functioning market in risk transmission will fundamentally hinge on:

(a) Clearly understanding and identifying the risks to be transferred;
(b) Developing appropriate instruments for transferring risks;
(c) Creating capability to measure and price risks; and
(d) Designing and implementing a legal and regulatory framework for contract enforceability and resolution.

Characterising the present state of risk transmission in India

Risk transmission markets in India remain under-developed particularly for individuals, although there have been several strong measures over the past few years.

Insurance is one of the best tools for household risk transmission. However, not more than 10% of the

Indian population has life insurance and less than 1% has any form of general insurance. Without access to formal insurance, a majority of households face financial emergencies in the wake of insurable events such as serious injury or illness and loss of crop or livestock. There is also a parallel concern that households are perhaps not buying adequate risk. Given low retail participation in equity markets, participants debated implications in terms of retirement security for the vast majority of households.

At the level of firms, the risk transfer market is evolving. Derivatives trading started at the National Stock Exchange (NSE) in 2000 and the full set of equity derivatives products were available in 2001. Volumes in these trades are now significant. Exchange traded currency and interest rate futures were launched as recently as 2008. Currency forwards have always been significant and have been the mainstay for exporters/importers. Commodity spot and futures exchanges have been set up over the past decade and are growing, although commodity options are not permitted yet.
As far as financial institutions are concerned, securitisation has grown from nothing at the beginning of the 1990s to approximately $6 billion in 2011[1] . However, this market is very shallow, relative to the size of India's economy. Credit default swaps were not permitted at the time of the conference in August. The Reserve Bank of India has subsequently allowed CDS products for bonds beginning late October, 2011.

Conference participants acknowledged the fact that while risk transmission mechanisms in India had come a long way from the early nineties; several gaps continue to exist in the present infrastructure for risk transmission. These gaps are attributed to a variety of factors:

a. For households, while risk transfer products exist, the key gap seems to be in high-quality distribution of those. Concerns with insurance and mutual fund selling processes and incentives have become severe in recent times. Absent this distribution infrastructure, households will continue to under-insure and under-invest.
b. There continue to be barriers for broad-based participation in a number of these markets.
c. Unavailability of certain risk transmission products on account of regulatory reasons (ex: Indian Treasury Bill Futures, inflation indexed bonds).
d. Absence of enabling public infrastructure for designing some risk transmission products. For instance, India has not invested enough in high quality rainfall measurement stations and this has impacted the availability of good data for designing rainfall insurance contracts.
e. Limited availability of certain risk transmission products on account of various environmental and infrastructural hurdles affecting accurate and efficient discovery of their prices. (ex: catastrophe insurance)

Key themes

Several ideas emerged during the course of participants' discussions on how best risk transmission mechanisms can be reinforced to function at an optimal level. These ideas can broadly be bracketed along the following themes.

1. Make transparent the quantum and nature of risks assumed by market participants
An important overall observation was that development of risk transfer mechanisms must be preceded by much more "paranoia" regarding risk management, particularly by government

1 *ICRA, "Update on Indian Securitisation Market - April, 2011"*

owned financial entities. There was a need to make transparent the embedded risks (ex: ALM mismatch) for large financial institutions, so that risk management and risk transfer are taken seriously. This was an important theme in the Risk Aggregation session as well in the context of the management of systemically important Financial Institutions.

Participants felt that current regulatory approaches (particularly for banks) use caps, limits and other such fiat-based measures disproportionately and do not adequately leverage market-based mechanisms to manage risk.

While rating agencies provide an important third-party view on risk, conference participants felt there was really no alternative to building robust internal risk management capabilities. Financial Institutions must focus on putting in place plans for dealing with reasonably expected failures (''known unknowns'').

2. Manage moral hazard in credit risk transfer markets

Participants felt that it was important to keep in mind moral hazard while designing risk transfer products, particularly for credit risk. In the specific context of securitisation markets, conference participants felt there was a need to be cautious about pure ''originate to distribute'' models. The concern was that this would create excessive moral hazard for the originator. It was discussed that the originator must retain ownership of credit risk in some form, thereby ensuring that it has the incentive to monitor credit risk, thus rooting out an instance of moral hazard in risk transmission.

3. Continue to focus on addressing missing markets for risk transmission

While important steps have been taken, participants felt that building risk transmission markets must continue to be an important financial policy objective. From a legal perspective, development of good resolution mechanisms is integral to the development of risk transfer markets. While the SARFAESI Act has been beneficial for banks vis-a-vis corporate lending, a lot more work is required on this front. Participants also noted the near total absence of thinking on the issue of household/personal bankruptcies. Overall, we need to increase accessibility of existing products at the household, firm and financial institution level by addressing existing barriers and simultaneously look into unaddressed risks, such as inflation.

Vision statement

In developing a vision for risk transmission within the financial system, participants came up with the following vision statement:

''To design, develop and sustain effective mechanisms that enable transfer of risk from households and originators to institutions than can better manage these risks.''