

**Global Index Insurance Facility (GIIF)**  
**Concept Note (Synopsis)**  
**Commodity Risk Management Group (CRMG)<sup>1</sup>, ARD, World Bank**

**Proposal**

It is intended to establish a new reinsurance vehicle, the “Global Index Insurance Facility” (GIIF), which would be a risk-taking entity to originate, intermediate and underwrite indexable weather, disaster and commodity price risks in developing countries.

**Index Insurance**

Traditional insurance products covering property related risks are written on what is often termed an “indemnity” basis. The policyholder insures a defined property, such as a building or crop, and in the event of that property being lost or damaged as a result of a covered peril, such as drought or windstorm, then the policyholder is compensated for their financial loss.

Particularly in relation to agricultural risks (crops) this business can be complex and very expensive, in terms of underwriting and claims handling costs, to write. There is an inherent exposure to moral hazard and even fraud which can be exacerbated if there a government provided premium subsidies.

Index (or parametric) insurance covers the same underlying perils but is not directly connected to a particular ‘property’. Instead the insurance policy pays out (the claim) in the event of a measurable occurrence of the peril. This might be when a number of rain free days has been exceeded, or if windstorm exceeds a certain threshold. This is a far more efficient way of covering these risks. However, it has to be recognized that the policy may pay out even if the policyholder has not sustained any loss and, more importantly, vice versa. This is known as basis risk.

Index insurance has been successfully introduced in developed markets such as the US and in some emerging markets , such as India.

**Development Rationale**

Economic growth prospects of developing countries are negatively impacted by external shocks, which create both short and longer-term physical and financial distress. The lack of coherent and timely response to shocks coupled with indirect impacts on growth and investment compound the cost of direct physical damage. Uninsured enterprises also do not develop their full earnings potential because they engage in low-risk/low-return activities to minimize downside risks. Generally too much capital goes into non-remunerated self-insurance. OECD countries, on the other hand, tend to be better equipped to manage shocks since they have larger diversified economies that can withstand such events and because private assets are insured. Demand for risk management instruments is often frustrated by market gaps and entry barriers. International reinsurers for example require substantial minimum risk amounts to start underwriting.

The GIIF seeks to close the gap between developing country demand for insurance against severe shocks at public and private levels and index insurance markets. The World Bank’s Commodity Risk Management Group (CRMG) already addresses the knowledge gap through technical assistance and the demonstration effects of pilot transactions, but credit and market gaps will limit its ability to scale up. GIIF would lower the entry barrier for international risk transfer by pooling smaller transactions and would thereby scale up risk transfer out of developing countries.

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<sup>1</sup> [www.itf-commrisk.org](http://www.itf-commrisk.org)

## Objectives

Assist in the development of a truly global market for **index-based insurance** instruments (some times referred to as parametric insurance) with deep outreach in developing countries and enhance access to markets for disaster risk-exposed countries and parties.

## Shareholders Structure

The Facility would consist of a new, dedicated reinsurance company with authorized capital of \$100m. Shareholders are anticipated to be a) Lead private sponsor with 30 – 50%; b) EIB and IFC with up to 20% each; and c) the balance from multilateral and bilateral investors. GIIF capital would be paid in gradually as the portfolio develops and as shareholder disbursement rules allow.

## Scope of Action

The facility will perform several commercial functions which will provide benefits to developing countries:

Developing Country Benefits	
Commercial Function	Benefits
Market Intermediation	Allows the transfer of previously unhedged and uninsured risks to the developed market
Risk Pooling	Allows even smaller transactions to find international reinsurance and lower premiums
Limited Holding of Risk (“Risk Warehousing”)	Provides market access and lowers premiums in clearly defined cases of unavailable or insufficient markets
Market Development	Facilitates transfer of technology (underwriting, risk modeling, rating, etc.) to local markets players

## Development of Local and International Private Markets

The GIIF will be managed by a small, dedicated team provided by the lead private sector sponsor – a leading, international reinsurance group experienced in the disaster and weather insurance market. The GIIF will also leverage the team capabilities with those of the parent lead sponsor. The sponsor will be responsible for ensuring proper technology is in place to assure the technical and financial sustainability of the vehicle. The limited capital base of the vehicle is intended to encourage the risk taking of other international market players. The market development role of the GIIF may be transitory and aimed at jumpstarting local index-based insurance markets and promoting efficiency by lowering the risk margins in developing countries. At the local level the GIIF will promote capacity development of the financial sector.

## Eligible Clients

The Facility would (re)insure governments and properly registered banks and primary insurers in developing countries. Eligible governments would need to couple the risk transfer with a proper country-level risk management framework.

## Eligible Risks

The Facility would reinsure against indexable catastrophic risks such as commodity prices and weather fluctuations (e.g. precipitation).<sup>2</sup> It may also cover cyclone tracks / hurricanes, earthquake indices (e.g. Richter scale) or any other related index that meet eligibility criteria (objective, measurable, transparent, sustainable, verifiable, etc.), where no reasonable commercial cover is available.

## Commercial and Investment Perspective

The GIIF will be a private sector joint stock company, operated on proper commercial lines with a clear objective to generate a operational return on equity commensurate with the risks. Individual contracts will be priced accordingly. Governance and internal controls will be consistent with this objective and representative of good commercial practice.

## Exit Strategy

This Facility seeks to catalyze a commercial market for index-based insurance products in developing countries by “crowding in” the private sector. Following the start-up phase of the GIIF, it is expected that the market for developing country risks will be sufficiently developed and competitive, to offer risk management products to end-user countries and clients at a reasonable cost. This will allow for the buy-out of the public interest in the GIIF by the private lead sponsor and other private parties, such as institutional investors. The expected exit time for IFC is 7-10 years.

## Demand Estimates

Potential effective demand for GIIF intermediation is very difficult to assess due to the nascent nature of index-based insurance markets in developing countries. However, at least with regard to disaster risk products and weather risk products, various indicators can help approximate demand:

- **OCHA and World Bank emergency assistance** and government budget reallocations in response to emergencies amount to **\$US 16.7 billion from 1980 to 2003**. Indexable share of this risk is assumed to be of \$US 7.3 billion, which yields an average disbursed risk amount of \$US 320 million for weather and disaster risk management exposures only per year.
- Demand for price risk management products can be deemed more important due to the commodity export dependence and oil import dependence of African Caribbean and Pacific (ACP) countries.
- More than 40 percent of farmers in developing countries face weather-related threats to their crops: adding up to **US\$429 billion per year in crop loss exposure** for farmers due to floods, drought and other weather-related conditions. With only 2 percent of this value index-insured, total insured sum could be around \$US 8 billion translating into approximately \$US 400 million in agricultural risk premiums.

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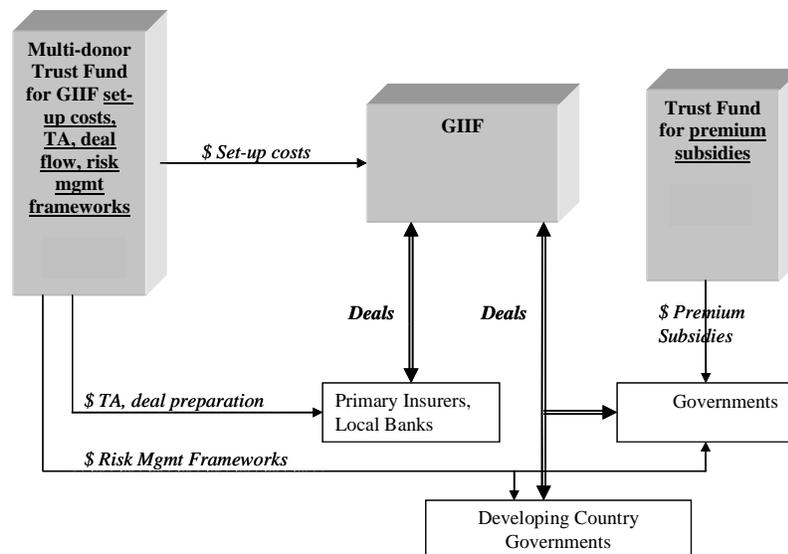
<sup>2</sup> **Price risk** management contracts will only be intermediated. The proposed product intends to offer coverage for catastrophic falls in price by offering protection in the form of far out-of-the money put option contracts to governments. Such contracts could be structured to offer price floors at market levels that are significantly, i.e. 50% or more, below current prices. The role of the facility would be to coordinate and aggregate these risks and intermediate the contracts into the market. Price risk will be administered in a separate window and will follow individualized underwriting guidelines.

- In sum, **total annual risk that could be transferred to the market ranges between \$US 0.2 billion and \$US 11.7 billion.**
- A rough potential **GIIF pipeline** overview, based only on the projects led by the CRMG TA programs, suggests overall expected **volumes of risk of \$US 136 million in 2006, \$US 214 million in 2007 and \$US 302 in 2008**, translating into premium volumes of respectively \$US12million, \$US19million and \$US24million.

### Additional Support from Donors

The average time for an appropriate loss modeling and index design (due diligence before taking on risk) lasts for about 12 months per transaction. In addition, there are mixed incentives for governments to manage risks since the donor community usually takes care of ex-post disaster relief. The donor community has expressed their interest to facilitate the alignment of incentives with governments with the ultimate goal of addressing the vulnerability profile of developing countries. The donor community is looking forward to encourage a migration from current adhoc post disaster assistance strategy to a broader strategic disaster planning through ex-ante risk management investment strategies.

For that purpose and with the aim of increasing the outreach of the GIIF, the donor community have endorsed the creation of two separated funds, one designed to assist the GIIF in sourcing the risks and the other co-finance the premiums paid by governments (See figure below).



Both funds will be managed by the WB and will be open to any donor (bilater or multilateral) willing to support any particular risk management agenda (regional or global).

The European Commission has allocated a total of **€25 million** for the GIIF related trust funds, as part of “conditional billion” package, final tranche of 9th EDF, 2003-2007, to Council Working Group of Member States. These development funds would target ACP countries. The European Commission has also pledged its support for the constitution of the Facility allowing this initial allocation of funds to cover start-up and operational costs (facility management, research and development, fees for structuring transactions, data collection, software, marketing, education, etc.)

In order to maintain a transparent structure of incentives, the co-financing function would be clearly separated from the profit-seeking Facility and is likely to be administered by CRMG. Governments will pay a full commercial premium for the coverage and will separately apply for the premium co-financing from this trust fund.

### **Support from the World Bank**

The ESSD VP Office strongly supports this Facility and currently supports the design work of the Facility and will espouse the development of transactions through CRMG/ARD and the technical support of risk management frameworks through the Hazard Management Unit.

The CRMG of the Agriculture and Rural Development (ARD) Department at the World Bank would support the Facility manager in these tasks, financed by Swiss, Netherlands and EU trust funds. CRMG partners with the World Bank’s Disaster Risk Management Facility as well as World Bank Institute on the training side in order to help countries address risk reduction and prepare prevention strategies. The Disaster Risk Management Facility has long and deep experience in assessing country’s disaster risk and advise on risk mitigation.<sup>34</sup> In addition CRMG would engage other providers such as RMS, AIR, CIAT, IRI etc. to analyze risk and design indices. Partnerships with organizations such as WFP and CDERA (Caribbean Disaster Emergency Response Agency – CARICOM) would be leveraged to engage the best-placed actor for each task.

### **Marketing**

Shareholders are expected to support business development, while CRMG will help to prepare deals. The Facility will also enter into marketing agreements with key distributors such as NGOs, brokers, and developing country-based (re)insurers and banks that include success fees and/or profit sharing arrangements in order to maximize deal flow.

### **Current Position and Next Steps**

CRMG, with background support from IFC, is in the process of selecting a private sector, lead sponsor who will be invited to work with IFC in the production of a formal investment proposal which can be considered by the potential IFI investors. It is expected that this process will be completed by mid December. Thereafter, the management of this project will transfer to IFC.

IFC, while supportive of the concept, has not yet made any commitment to investing in the GIIF, nor can it until a specific proposal has been prepared and considered. The position of EIB is similar.

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<sup>3</sup> <http://www.worldbank.org/hazards/>

<sup>4</sup> The World Bank Caribbean country department undertakes a series of hazard modeling studies in 11 Caribbean countries (PHRD grant). The insurance unit (FSD) is ready to support this effort with experience from Turkey (EQ insurance pool) and elsewhere.

CRMG and IFC are currently inviting expressions of interest from other potential IFI investors.