International Association of Insurance Supervisors

Global Systemically Important Insurers: Proposed Assessment Methodology

31 May 2012

Public Consultation Document

Comments due by 31 July 2012

Cover note

The global financial crisis underscored the interconnected nature of financial firms and the severe financial and economic costs associated with public sector interventions for those that were distressed or expected to fail. It also underscored the need to act promptly and proactively to identify firms that are systemically important and to take measures to lessen the impact and reduce the moral hazard associated with the failure of such firms.

As such, the International Association of Insurance Supervisors (IAIS) is participating in a global initiative, along with other standard setters, central banks and financial sector supervisors, and under the purview of the Financial Stability Board (FSB) and G20, to identify global systemically important financial institutions (G-SIFIs[1]). The focus of IAIS analysis is in relation to potential global systemically important insurers (G-SIIs).

To this end, the IAIS has developed an assessment methodology to identify any insurers whose distress or disorderly failure, because of their size, complexity and interconnectedness, would cause significant disruption to the global financial system and economic activity. Any such insurers should be regarded as systemically important on a global basis. In order to obtain feedback from Members, Observers, and other interested parties on the methodology, the IAIS has prepared the attached consultation document.

In addition to an assessment methodology, the IAIS is also developing policy measures that could be applied to insurers that are determined to be G-SIIs. An early indication of these measures is also contained in the consultation document. There will be a separate consultation process on those policy measures later this year when more detail is available. Accordingly, the IAIS is not seeking specific comments on policy measures, at this stage.

Interested parties may wish to consult relevant background papers which are available on the IAIS, FSB and Basel Committee on Banking Supervision (Basel Committee) websites, including the IAIS' report *Insurance and Financial Stability.*[2] Other key papers include:

- the IMF/FSB/Bank for International Settlements (BIS) staff report submitted to the G20 Finance Ministers and Central Bank Governors entitled *Guidance to Assess the Systemic Importance of Financial Institutions, Markets and Instruments*[3] (October 2009);

- the FSB's recommendations on *Reducing the moral hazard posed by systemically important financial institutions (SIFIs)* [4] (October 2010);

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[1] G-SIFIs are defined by the FSB as "institutions of such size, market importance, and global interconnectedness that their distress or failure would cause significant dislocation in the global financial system and adverse economic consequences across a range of countries." G-SIIs are one class of G-SIFIs.

[2] See IAIS (2011) http://www.iaisweb.org/Other-papers-and-reports-46

[3] See http://www.imf.org/external/np/g20/pdf/100109.pdf

[4] See http://www.financialstabilityboard.org/publications/r_101111a.pdf

- the Basel Committee framework for identifying global systemically important banks (G-SIBs) and requirements for additional loss absorbency for G-SIBs[5] (November 2011); and

- the determination of the first cohort of G-SIBs[6] (November 2011).

Comments are encouraged and should be sent to the IAIS Secretariat by 31 July 2012 via the Consultations page on the IAIS website http://iaisweb.org/. All comments will be published on the IAIS website, unless a specific request is made for comments to remain confidential.

[5] See http://www.bis.org/publ/bcbs207.pdf

[6] See http://www.financialstabilityboard.org/publications/r_111104bb.pdf

Glossary of abbreviations

ART	Alternative Risk Transfer
BCBS	Basel Committee on Banking Supervision (also Basel Committee)
BIS	Bank for International Settlements
CDO	Collateralised Debt Obligation
CDS	Credit Default Swap
FSB	Financial Stability Board
G-SIBs	Global Systemically Important Banks
G-SIFIs	Global Systemically Important Financial Institutions
G-SIIs	Global Systemically Important Insurers
G20	Group of Twenty Countries
HLA	Higher Loss Absorbency
IAIGs	Internationally Active Insurance Groups
IAIS	International Association of Insurance Supervisors
ICPs	IAIS Insurance Core Principles
IFS	IAIS *Insurance and Financial Stability* paper
IGT	Intra-group Transactions
ILS	Insurance-linked Securities
KA	FSB's *Key Attributes for Effective Resolution Regimes*
NTNIA	Non-traditional Insurance and Non-insurance Activities
SIE	FSB's *Supervisory Intensity and Effectiveness* recommendations
SIFIs	Systemically Important Financial Institutions

Contents

I. Introduction

1. The International Association of Insurance Supervisors (IAIS) is participating in a global initiative, along with other standard setters, central banks and financial sector supervisors, and under the purview of the Financial Stability Board (FSB) and G20, to identify global systemically important financial institutions (G-SIFIs[7]). The focus of IAIS analysis is in relation to potential global systemically important insurers (G-SIIs). To this end, the IAIS has developed an assessment methodology to identify any insurers whose distress or disorderly failure, because of their size, complexity and interconnectedness, would cause significant disruption to the global financial system and economic activity. Any such insurers should be regarded as systemically important on a global basis. In order to obtain feedback from Members, Observers, and other interested parties on the methodology, the IAIS has prepared this consultation document.

2. At the Summit meeting in Seoul, November 2010, the G20 leaders endorsed a report by the Financial Stability Board (FSB) on reducing the moral hazard posed by systemically important financial institutions. The report recommends several policies which should combine to:

   - Improve the authorities' ability to resolve SIFIs in an orderly manner without destabilising the financial system and exposing the taxpayer to the risk of loss,
   - Require higher loss absorbency for SIFIs to reflect the greater risks that these institutions pose to the global financial system,
   - Apply more intensive and co-ordinated supervision of SIFIs,
   - Strengthen core financial infrastructures, and
   - Provide other supplementary prudential and other requirements as determined by the national authorities.

3. Initially, G-SIFI related work focussed on the banking sector, because that was a more immediate issue. The Basel Committee on Banking Supervision (Basel Committee) developed a framework for identifying global systemically important banks (G-SIBs). This framework, including requirements for additional loss absorbency, was contained in a rule text published in November 2011.[8] The first list

[7] G-SIFIs are defined by the FSB as "institutions of such size, market importance, and global interconnectedness that their distress or failure would cause significant dislocation in the global financial system and adverse economic consequences across a range of countries." Global systemically important insurers (G-SIIs) are one class of G-SIFIs.

[8] See http://www.bis.org/publ/bcbs207.pdf - the rules text includes the following comments: "During the recent financial crisis that started in 2007, the failure or impairment of a number of large, global financial institutions sent shocks through the financial system which, in turn, harmed the real economy. Supervisors and other relevant authorities had limited options to prevent problems affecting individual firms from spreading and thereby undermining financial stability. As a consequence, public sector intervention to restore financial stability during the crisis was necessary and conducted on a massive scale. Both the financial and economic costs of these interventions and the associated increase in moral hazard mean that additional measures need to be put in place to reduce the likelihood and severity of problems that emanate from the failure of global systemically important financial institutions (G-SIFIs). … A number of the policy measures will have a

of 29 G-SIBs was disclosed by the FSB at the same time.[9] The Basel Committee commented: "There is no single solution to the externalities posed by G-SIBs. Hence the official community is addressing the issues through a multipronged approach. The broad aims of the policies are to reduce the probability of failure of G-SIBs by increasing their going-concern loss absorbency and to reduce the extent or impact of failure of G-SIBs, by improving global recovery and resolution frameworks."

4. It was foreshadowed in the FSB's October 2010 report that the framework for dealing with SIFIs would be extended to cover insurance companies.[10] G20 Leaders, at Cannes in November 2011, reiterated their expectation for the IAIS to complete its assessment methodology for identifying G-SIIs in time for the G20 Summit in June 2012.[11]

5. Given the importance of stable financial markets and recognising that part of its mission is to contribute to global financial stability, as stated in its by-laws, the IAIS has been examining the issue intensively.

6. This consultation document sets out the results of the IAIS work and proposes an assessment methodology for assessing systemic importance of insurers. In addition, this consultation document sets out an early indication of policy measures that could be applied to G-SIIs, if any are identified, and also future steps that the IAIS aims to take.

particular impact on global systemically important banks (G-SIBs), given their business models have generally placed greater emphasis on trading and capital markets related activities, which are most affected by the enhanced risk coverage of the capital framework. These policy measures are significant but are not sufficient to address the negative externalities posed by G-SIBs nor are they adequate to protect the system from the wider spillover risks of G-SIBs. The rationale for adopting additional policy measures for G-SIBs is based on the cross-border negative externalities created by systemically important banks which current regulatory policies do not fully address."

[9] See http://www.financialstabilityboard.org/publications/r_111104bb.pdf FSB (2011) "[The] initial list is based on the methodology set out in the BCBS document *Global systemically important banks: Assessment methodology and the additional loss absorbency requirement*, using data as of end-2009. The list of G-SIFIs will be updated annually and published in November every year. Therefore, the list will not be fixed – there can be new entries and exits every year and the number of G-SIFIs may change. The BCBS methodology will be reviewed every three years to capture changes in the banking system and progress in measuring systemic importance. The present list contains global systemically important banking groups; future lists may also contain G-SIFIs that are not banking groups."

[10] See http://www.financialstabilityboard.org/publications/r_101111a.pdf. FSB (2010) states: "As experience is gained, the FSB will review how to extend the framework to cover a wider group of SIFIs, including financial market infrastructures, insurance companies and other non-bank financial institutions that are not part of a banking group structure."

[11] See http://www.financialstabilityboard.org/publications/r_111104bb.pdf FSB (2011) "Policy Measures to Address Systemically Important Financial Institutions": "The International Association of Insurance Supervisors (IAIS) is expected to complete its assessment methodology for identifying globally [sic] systemically important insurers in time for the G20 Summit in June 2012. The IAIS will also pursue its work to develop a Common Framework for the Supervision of Internationally Active Insurance Groups by 2013, in order to foster group wide supervision and global convergence of regulatory and supervisory approaches."

A. IAIS position on insurance and financial stability issues

7. In developing the methodology, consideration was given to the fact that the traditional insurance business model is different from banking and, in particular, that traditional business does not involve payment system, credit intermediation or investment banking services. In November 2011, the IAIS published a report entitled *Insurance and Financial Stability* that describes the IAIS' view of the relationship between the insurance sector and financial stability. This paper followed publication of a June 2010 position statement stressing the importance of the longer timeframe that applies to insurance liabilities[12] and the importance of insurance techniques that rest on the pooling of insurance risks, including the notion of insurable interest.[13] The remainder of Section I summarises the most important conclusions of these papers relevant to developing the methodology.

8. Insurance is founded on the law of large numbers which basically states that the aggregation of a large number of idiosyncratic risks ultimately results in a normal curve of distribution. It is therefore fair to say that the business model of insurance is based upon the assumption of a large number of ideally uncorrelated risks from policyholders to build up and maintain a well-diversified portfolio. In practice, this means that, with an increasing portfolio, there is less opportunity for unexpected results and a lower probability of very large losses (in relation to the entire portfolio). The risk profile of an insurer becomes less risky the more risks are assumed, i.e. the larger it is and the more diversified its business is (the more lines of business it writes).

9. The insurance business underwrites risks, and insurance claims become due upon the occurrence of idiosyncratic claims events that relate to:

- Mortality,
- Morbidity,
- Property, and
- Liability risks.

10. The insurance business model has several unique features which are not typically found in banking, such as:

- Insurance techniques rest on the pooling of insurance risks and probability theory such as the law of large numbers,
- Insurers undertake a predominantly liability-driven investment approach,
- The nature of insurance claims results in cash outflows that can occur over an extended period of time, and

[12] See IAIS (2010) http://www.iaisweb.org/Other-papers-and-reports-46: "In spite of this, insurers sometimes become financially distressed and, in a competitive market, financial distress and insolvencies may occur from time to time. The financial distress of an insurer usually plays out over a long time horizon. That is, assets of the insurer do not need to be liquidated until claims or benefits under the policies need to be paid, and this will not occur until months or even years in the future. Accordingly, regulators usually have the time to intervene to reduce potential losses to policyholders from the insolvency."

[13] See IAIS (2011) "Insurable interest can be defined as an interest in a person or a good that will support the issuance of an insurance policy; an interest in the survival of the insured or in the preservation of the good that is insured. … Financial derivatives are not considered insurance for regulatory purposes."

- A high degree of substitutability.

11. In general, insurance underwriting risks are not correlated with the economic business cycle and financial market risks and the magnitude of insurance events is not affected by financial market losses. The nature of insurance liabilities, and the fact that payments to policyholders generally require the occurrence of an insured event, makes it less likely for insurers engaged in traditional activities to suffer sudden cash runs that would drain liquidity.

12. Insurers are, however, also exposed to risks faced by other financial institutions including credit risk, operational risk, and market risk as well as interest rate and exchange rate risks. Nevertheless, the unique aspects of the insurance business model described above enabled most insurers to withstand the financial crisis of 2008-09 better than other financial institutions. While the effects of the crisis were certainly felt by the insurance industry, insurers engaged in traditional insurance activities in general were able to absorb the impact and demonstrated no impact on the broader financial system from a systemic risk perspective.

13. In contrast, insurance groups and conglomerates that engage in non-traditional or non-insurance activities can be more vulnerable to financial market developments and may therefore be more likely to amplify, or contribute to, systemic risk, than traditional insurers. Examples of non-traditional and non-insurance activities include financial guaranty insurance, capital markets activities such as credit default swaps (CDS), transactions for non-hedging purposes, derivatives trading or leveraging assets to enhance investment returns. In addition, the continually evolving marketplace is resulting in products and activities that blur the lines between traditional insurance and bank-type (or investment bank-type) activities.

14. While the separation of insurance from non-insurance activities may be comparatively easy, the demarcation between traditional and non-traditional lines of business (or products) can be blurry. Different jurisdictions allocate different activities to different fields. For example, a number of jurisdictions classify variable annuities closer to traditional life insurance, while others, in light of the dominant investment component in these products, see them closer to non-traditional insurance activities. Without being exhaustive, Table 1 proposes an illustrative allocation of various business activities, accounting for the fact that some business activities fall in-between the traditional and non-traditional categories.

15. Under Table 1, reinsurance is considered as a part of traditional insurance activities. Unlike the interbank market, reinsurance (and retrocession thereof) generates a largely hierarchical interconnectedness within the insurance sector. The redistribution of insurance risks takes the form of a diversification on the primary insurance level, and a controlled concentration of the same risks at the reinsurance level. Reinsurers provide insurance for primary insurance companies and apply the same business model as primary insurers. Reinsurers can be a source of stabilisation, as was the case in the last crisis.

16. However, reinsurers are often believed to contribute to systemic risk in insurance. One argument builds on the view that the interbank market and the reinsurance market are morphologically equivalent. There is, however, no inter-insurance market similar to the inter-bank market. Also, the volume and frequency of reinsurance transactions do not bear comparison with trading on the interbank and capital markets. Thus, the degree of interconnectedness within the reinsurance sector is relatively small.

Table 1: Illustrative allocation of activities conducted by insurance-focused groups

		Traditional ➡	Semi-traditional	⬅ Non-traditional
Insurance	**Underwriting**	• Most life and non-life (re)insurance business lines	• Life insurance and variable annuities with additional guarantees • Mortgage guarantee insurance • Trade credit insurance	• Alternative risk transfer (ART), incl. insurance-linked securities (ILS) • Financial guarantee insurance • Finite reinsurance
	Investments and funding	• Proprietary investment function (asset/liability matching (ALM)) • Hedging for ALM purposes • Funding through equity and debt issues; also securities lending	• Proprietary and derivatives trading (non-ALM) • Property management (related to investment portfolio)	• Purely synthetic investment portfolios • Cascades of repos and securities lending • Scope and scale of activities beyond insurance remit
Non-insurance		• CDS/CDO underwriting • Capital market business • Banking, incl. investment banking and hedge fund activities • Third-party asset management • Industrial activities		

17. It is also important to underscore that non-insurance activities (for example third-party asset management) are not necessarily of systemic importance.

18. In summary, neither long experience of insurance markets nor information arising from the global financial crisis provides any evidence of traditional insurance either generating or amplifying systemic risk within the financial system or in the real economy. The potential for systemic importance is only considered to arise in any non-traditional or non-insurance activities which may be undertaken by a small number of insurers.

19. However, empirical assessments of the systemic importance of insurers and insurance groups may change over time. A benign record in the past does not ensure the absence of a systemic risk potential in the future. That is why the IAIS is committed to reviewing the pace of innovation and change in insurance business models and assessing the potential for individual insurers to be classified as systemic.

II. Assessment methodology for systemic importance of G-SIIs

20. The IAIS has developed a methodology to assess the systemic importance of G-SIIs and tested that methodology using year-end 2010 data collected from selected insurers in 2011. The proposed assessment methodology involves three steps: collection of data,[14] methodical assessment and a supervisory judgment and

[14] The Bank for International Settlements (BIS) collaborated with the IAIS by providing secured transmission channels for the collection of confidential data.

validation process. This section describes how these three steps are proposed to work in the IAIS assessment methodology.

21. This section first describes the scope of data collection and the challenges the IAIS encountered. Following this, the proposed assessment approach is described. Finally, the proposed modality of the supervisory judgment and validation process is explained.

22. The proposed assessment approach is indicator-based and has several advantages[15] and similarities to the approach developed by the Basel Committee for G-SIBs. For example, there is considerable overlap in the categories of indicators. However, insurers vary widely from banks in their structures and activities and consequently in the nature and degree of risks they pose to the global financial system. Thus, the particular indicators selected for identifying G-SIIs reflect different drivers of possible negative externalities and hence of the importance of insurers for the stability of the financial system.

23. As indicated by the Basel Committee, no assessment approach will perfectly measure systemic importance across all global financial institutions. Thus, similar to the Basel Committee approach in identifying G-SIBs, the IAIS methodology also recognises the importance of supervisory judgment and validation of the results flowing from the indicator approach. The IAIS supervisory judgment and validation process includes additional qualitative and quantitative assessments.

24. The additional quantitative assessment takes the form of a business segment specific risk-weight assessment approach that is structurally aligned with the concepts described in *Insurance and Financial Stability*. This approach is referred to as the "IFS assessment approach." The IFS assessment approach centres around segmenting the business portfolio of insurance companies and insurance-dominated groups and conglomerates in traditional insurance, semi- and non-traditional insurance activities as well as non-insurance financial and non-insurance industrial activities,[16] as the systemic importance of the aforementioned business activities ranges from marginal (in traditional insurance) to potentially significant (in non-insurance financial activities, e.g. banking).

A. Data issues

(A) Scope of data collection

25. The dynamic nature of insurers' business models and the financial markets in which they operate means assessing the systemic importance of insurers requires recent, consistent and good quality data. Because many of the data items are either not publicly available or not publicly available on a consistent basis, the IAIS collected relevant data items from selected global insurance groups. The IAIS requested insurers to report data to their respective supervisors as of year-end 2010, based on

[15] As indicated by the Basel Committee, "The advantage of the multiple indicator-based measurement approach is that it encompasses many dimensions of systemic importance, is relatively simple, and is more robust than currently available model-based measurement approaches and methodologies that only rely on a small set of indicators or market variables". See http://www.bis.org/publ/bcbs207.pdf.

[16] Non-insurance financial and non-insurance industrial activities are included in the bottom section of Table 1 above.

group level data consolidated for accounting purposes, including all insurance entities and non-insurance entities. Some data items were difficult for all insurers to provide on a consolidated basis and aggregate data reflecting major entities in the group may have been reported instead.

26. Data was requested and obtained through the respective national supervisors from 48 insurers in 13 jurisdictions selected according to the following criteria:

- Insurance groups whose total assets were USD 60 billion or more and whose ratio of premiums from jurisdictions outside the home jurisdiction to total premiums was 5% or more.
- Insurance groups whose total assets were USD 200 billion or more and whose ratio of premiums from jurisdictions outside the home jurisdiction to total premiums was between 0% and 5%.
- Finally, a few insurers, such as financial guaranty insurers, were added to the scope by supervisory judgment.

(B) Data quality

27. Unlike the banking sector where BIS statistics cover various areas of banking activities on a global basis, the IAIS has few precedents for collecting data on a global basis for the insurance sector. One such precedent is the data collected for IAIS Global Reinsurance Market Reports[17] which the IAIS has been collecting for almost ten years. However, the nature, scope and scale of the data collected to test the G-SII assessment methodology is a significant new undertaking for the IAIS. The IAIS encountered several challenges to collecting consistent and high quality data, including:

- Insurers' management information systems do not necessarily provide all consolidated data items which were requested by the IAIS.[18]
- Accounting differences exist, including differences in valuation of some assets, derivatives, insurance contracts and technical provisions.
- Jurisdictional or regional differences exist in the interpretation of some insurance business terms.
- Definitions provided for some data items require more specificity.[19]

28. In cooperation with the respective national supervisors, the IAIS improved the data quality and consistency by comparing information to public sources where available and, where appropriate, by further consulting with relevant supervisors. The adjusted data was considered satisfactory for developing a proposed assessment methodology.

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[17] See http://iaisweb.org/Global-Reinsurance-Market-Report-GRMR-538

[18] Unlike the role played by the BIS and the Basel Committee for the banking sector, there is no consolidated regulatory data collection for the insurance sector by the IAIS.

[19] Due to the reasons given above, establishing definitions that are sufficiently clear and comparable across jurisdictions/regions is a challenge.

29. The IAIS will further improve data quality and consistency and is planning to collect year-end 2011 data based on revised instructions and definitions, taking into account the experiences of the year-end 2010 data collection exercise and recent developments.

B. Methodical assessment process

30. Global systemic importance needs to be primarily measured in terms of the impact that distress or failure of an insurer may have on the global financial system and the wider economy rather than in terms of the probability of a failure. This is consistent with the Basel Committee approach.

(A) Indicator-based assessment approach

31. The indicator-based assessment approach is related to the Basel Committee's G-SIB methodology. However, the specific nature of the insurance sector, as described in *Insurance and Financial Stability*, has influenced the selection, grouping and weights assigned to certain indicators.

32. The selected indicators can be grouped into five categories:

- Size: The importance of a single component for the working of the financial system generally increases with the amount of financial services that the component provides. It should be recognised, however, that in an insurance context size is a prerequisite for effective pooling and diversification of risks.
- Global Activity: The methodology is aimed at identifying components of the financial system whose failure can have large negative externalities on a global scale.
- Interconnectedness: Systemic risk can arise through direct and indirect inter-linkages between the components of the financial system so that individual failure or distress has repercussions around the financial system, leading to a reduction in the aggregate amount of services.
- Non-traditional and non-insurance activities: As described in *Insurance and Financial Stability*, non-traditional insurance activities and non-insurance financial activities are potential drivers of the systemic importance of insurers and thus have the greatest impact upon failure.
- Substitutability: The systemic importance of a single component increases in cases where it is difficult for the components of the system to provide the same or similar services in the event of failure.

33. The IAIS has identified indicators which contribute to capturing the degree and nature of each insurer's systemic importance in each of the five categories from multiple-dimensions. The following table describes the 18 indicators chosen for the proposed assessment methodology and the reasons for choosing them. To capture impact given failure, indicators are mostly incorporated as absolute value figures, although in some cases ratios are also used to capture a relative impact given failure, typically comparing the size of a given activity with a relevant aggregate measure.

Category: **Size**

Indicator	*Content*	*Rationale*
Total assets	Total on balance sheet asset size	Straightforward indicator of size
Total revenues	Sum of insurance gross premium earned, investment income, realised gains and losses, fees and commissions, and other income	Indicates the extent or scale of financial services of an insurer from a different angle. (Looking at only asset size may underestimate activities of non-life insurers.)

Category: **Global activity**

Indicator	*Content*	*Rationale*
Revenues derived outside of home country	Sum of the total revenues recognised from jurisdictions outside the home country	Indicates the extent of global activity from a revenue perspective
Number of countries	Number of countries where a group operates with branches and/or subsidiaries outside of the home country	Indicates the extent of global activity from an operational perspective

Category: **Interconnectedness**

Indicator	*Content*	*Rationale*
Intra-financial assets	Sum of lending to financial institutions and holdings of securities (debt securities, commercial paper, certificates of deposit and equity) issued by other financial institutions	Indicates the potential for failure or distress of an insurer to impact the financial system through fire sales of assets
Intra-financial liabilities	Sum of borrowing from financial institutions and issuance of securities (debt securities, commercial paper, certificates of deposit and equity) owned by other financial institutions	Indicates the degree to which failure or distress of an insurer could impact those with exposures to it
Reinsurance	Gross technical provisions for reinsurance assumed business	Indicates the degree of interconnectedness with the insurance sector through reinsurance transactions
Derivatives	Gross negative fair value of derivatives liabilities (gross of collateral, netted for counterparties) with other firms	Indicates the degree of interconnectedness with the financial system through derivatives transactions

Indicator	*Content*	*Rationale*
Large exposures	Combination of: (a) Total asset exposures to the 10 largest counterparties (including counterparties in derivative transactions), and (b) Ratio of total asset exposures to the 10 largest counterparties to total assets	Indicates the degree of interconnectedness focusing on concentrations in asset exposures to major counterparties In its ratio form this indicator could point towards insurers that have a higher degree of concentrations in assets.
Turnover	Two ratios: (a) Ratio of total purchase of invested assets* plus total sale of invested assets to total assets, and (b) Ratio of total sales (issuance) of funding liabilities* plus total retirement of funding liabilities to total liabilities *in accordance with cash flow statements	This indicator could point towards insurers that are more active in the capital markets than is normal for a traditional insurance business.
Level 3 assets	Combination of: (a) Total level 3 assets, and (b) Ratio of total level 3 assets to sum of level 1, 2 and 3 assets[20]	Indicates the potential scale of fire sales of illiquid assets by an insurer in distressed financial market situations In its ratio form it could point towards insurers that are more active in markets for complex assets than is normal for a traditional insurance business.

[20] Level 1 Assets are based on unadjusted, quoted prices for identical assets in an active market. Level 2 Assets are based on quoted prices in inactive markets, or whose values are based on models - but the inputs to those models are observable either directly or indirectly for substantially the full term of the asset. Level 3 Assets are based on prices or valuation techniques that require inputs that are both unobservable and significant to the overall fair value measurement.

Category: **Non-traditional insurance and non-insurance activities (NTNIA)**

Indicator	*Content*	*Rationale*
Non-policy holder liabilities and non-insurance revenues* *In the final methodology, this indicator will focus on financial activities.	Combination of: (a) Total on balance sheet liabilities minus all policyholder liabilities,* (b) Ratio of (a) to total on balance sheet liabilities, (c) Total revenues from non-insurance businesses, and (d) Ratio of (c) to total revenues * all technical provisions held for fulfilling insurance contracts	Indicates the extent to which an insurer conducts NTNIA using both balance sheet and revenue figures Policyholder liabilities are a proxy for traditional insurance activities: "total liabilities minus policyholder liabilities" indicates NTNIA. In its ratio form it could point towards insurers that do more NTNIA than is normal for traditional insurers.
Derivatives trading	Gross notional amount of CDS protection sold	Indicates the scale of CDS protection sold which links an insurer with other parts of the financial system An insurer's distress or failure could impact financial positions of buyers of CDS protection.
Short term funding	Combination of: (a) Absolute sum of: • Short term borrowing, • Commercial paper issued, • Certificates of deposit issued, • Gross value of repos, and • Gross value of securities lent; and (b) Ratio of sum of the above mentioned items to total assets	Indicates the extent to which an insurer could be involved in maturity transformation A large degree of short-term funding is a feature of financial institutions involved in maturity transformation. Ratios pointing to a larger-than-normal amount of short-term funding could signal an insurer venturing into this kind of business and assuming the liquidity risks that come with it, including the potential for fire sales of assets.
Financial guarantees	Combination of: (a) Gross notional amount of debt securities including structured finance insured for financial guarantee. Not including CDS protection sold or surety bonds, and (b) Risk in force for mortgage guarantee insurance, which is the gross mortgage default amount covered by all mortgage insurance policies issued	Financial guarantee and mortgage guarantee products link an insurer with other parts of the market and are correlated with the economic cycle. An insurer's distress and failure could impact the financial positions of guaranteed parties.

Indicator	Content	Rationale
Variable annuities	Total technical provisions for variable annuities and contingent annuities including additional technical provisions for any guarantees	Variable annuities most often include some type of guaranteed levels of payment to policyholders: attempting to pay guaranteed amounts could accelerate asset sales by an insurer and exacerbate already distressed market conditions. There is also the possibility that hedging strategies for guarantees could adversely affect markets in times of wider market stress.
Intra-group commitments	Combination of: (a) Intra-group commitments granted by insurance entities or the top holding company of an insurance group for the benefit of non-insurance entities of the group, and (b) Ratio of intra-group commitments granted by insurance entities or the top holding company of an insurance group for the benefit of non-insurance entities of the group to total assets	A large amount of intra-group support given to the non-traditional / non-insurance entities of the group may indicate significant NTNIA and/or lack of self-sufficiency of NTNIA. Many intra-group commitments can also indicate a complex company structure and greater difficulties in resolving an insurance group or conglomerate. The ratio is used to account for the fact that the size of intra-group commitments could overestimate (underestimate) the issue in case of a large- (small-) sized insurance company.

Category: **Substitutability**

Indicator	Content	Rationale
Premiums for specific business lines	Combination of: (a) Direct gross premiums written and assumed premiums for credit coverage including mortgage guarantee coverage, financial guarantee and export credit coverage, (b) Direct gross premiums written and assumed premiums for aviation coverage, and (c) Direct gross premiums written and assumed premiums for marine coverage	Indicates the degree of lack of substitutability in some specific insurance markets The three markets selected are considered to be significant and highly concentrated markets in a global context.

34. In addition to the 18 indicators above, the final methodology will most likely incorporate additional indicators, including:

- The amount of derivatives trading without hedging purposes in economic terms; and
- The extent of liquidity of insurance liabilities (that is, the degree of those liabilities that are callable on demand or at short notice).

These indicators would provide useful information on the degree of speculative derivatives trading and the potential for an "insurance run" to occur because the liabilities are more exposed to being "on demand" than traditional insurance liabilities.

35. As discussed in *Insurance and Financial Stability*, the two most important categories for assessing the systemic importance of insurers are the non-traditional insurance and non-insurance activities category and the interconnectedness category. Non-traditional and non-insurance activities are important because the longer timeframe over which insurance liabilities can normally be managed may not be present, and interconnectedness is important because there can be strong connections between the insurance and banking sectors. Therefore, these indicators should receive higher weights.

36. Consequently, the size, global activity and substitutability categories should be given lower weights. This is consistent with the risk diversification benefits that can accrue with greater size of traditional insurance activities and global spread, and the usual speed with which loss of insurance capacity is replaced by new entrants into the market. Size and global activity indicators were also used in the initial selection of those insurers included in the scope of the data collection exercise. Furthermore, analysis also shows that several of the indicators in other categories are to some extent correlated with size. Assigning a lower weight to the size category avoids allowing size a disproportionate influence on the overall result. Although not a separate category of its own (as in the Basel Committee's approach), complexity has been captured by some of the indicators within the other categories (e.g. intra-group commitments).

37. Taking these factors into consideration, higher weights should be given to the non-traditional insurance and non-insurance activities category and the interconnectedness category, while lower weights should be given to the other three categories. Following review of various scenarios, the IAIS proposes that the weighting for the non-traditional insurance and non-insurance category should be 40% to 50%, the weighting for the interconnectedness category should be 30% to 40%, and the weighting for the other three categories should be 5% to 10% for each. Within all five categories, equal weight should be given to each indicator.

Category	*Category weighting*	*Individual indicator*	*Indicator weighting*
Size	5% - 10%	Total assets	2.5% - 5%
		Total revenues	2.5% - 5%
Global activity	5% - 10%	Revenues derived outside of home country	2.5% - 5%
		Number of countries	2.5% - 5%
Interconnectedness	30% - 40%	Intra-financial assets	4.3% - 5.7%
		Intra-financial liabilities	4.3% - 5.7%
		Reinsurance	4.3% - 5.7%
		Derivatives	4.3% - 5.7%
		Large exposures	4.3% - 5.7%
		Turnover	4.3% - 5.7%
		Level 3 assets	4.3% - 5.7%
Non-traditional insurance and non-insurance activities	40% - 50%	Non-policy holder liabilities and non-insurance revenues	6.7% - 8.3%
		Derivatives trading	6.7% - 8.3%
		Short term funding	6.7% - 8.3%
		Financial guarantees	6.7% - 8.3%
		Variable annuities	6.7% - 8.3%
		Intra-group commitments	6.7% - 8.3%
Substitutability	5% - 10%	Premiums for specific business lines	5% - 10%

38. For each insurer, the score for a particular indicator is calculated by dividing the individual insurer amount by the aggregate amount summed across all insurers in the sample for a given indicator. When an indicator consists of a combination of sub-indicators, the same calculation will be done for each sub-indicator; the results will be averaged to reach the score for the indicator overall.

39. The score is weighted by the indicator weighting within each category. Then, all the weighted scores are added. For example, the total asset size indicator for an insurer that accounts for 10% of the sample aggregate total asset size variable will receive a score of 10%. If the indicator weighting for the total asset size is X%, it will contribute (10%) x (X%) to the total score for the insurer. Similarly, if the indicator weighting for the total intra-financial assets is Y%, an insurer that accounts for 10% of intra-financial assets would receive a score of 10% that would in turn contribute (10%) x (Y%) to the total score for the insurer. Summing the scores for the 18 indicators gives the total score for the insurer. The maximum possible total score (i.e. if there were only one insurer in the world) is 100%; if an insurer accounts for 10% of each of the 18 indicators, its total score would be 10%.

(B) IFS assessment approach

40. The IFS assessment approach is more directly based on the concepts described in *Insurance and Financial Stability*. It adopts a business segment specific approach.

41. In essence the IFS assessment approach segments the business portfolio of an insurer into its traditional insurance, semi- and non-traditional insurance as well as non-insurance financial and industrial activities. Then, the assessment approach associates risk weights commensurate with the systemic importance of the various business activities of insurance companies. The risk weights are multiplicative factors of total assets broken down along the segmentation of the business portfolio of insurance companies. The risk weights reflect the IAIS position that systemic importance in insurance is primarily associated with the conduct of non-insurance financial and non-traditional insurance business. The IFS assessment approach is being considered as part of the supervisory judgment and validation process and provides for a validation of the outcomes of the indicator-based assessment approach.

42. Both the indicator-based and the IFS assessment approach are consistent with the concepts expressed in *Insurance and Financial Stability*. The supervisory judgment and validation phase of the overall methodology aims at producing a more robust assessment of the systemic importance of insurers supporting the results of the indicator-based assessment approach with the segment-based IFS assessment approach. The IFS assessment approach does not use indicators as proxies of systemic importance that may potentially fail to cover certain risky activities, but assesses each segment of business comprehensively on its own.

43. Further information on the approach is contained in the Annex.

(C) Cut-off point

44. Following the ranking of insurers according to the indicator-based assessment approach, it is necessary to establish a cut-off point between G-SIIs and non-G-SII candidates. When the FSB and national authorities, in consultation with the IAIS, determine the cohort of G-SIIs, an informed decision on the cut-off point will be made, based on data sets as of year-end 2011 (see paragraph 72). The IAIS is of the view that, amongst other options, a comparison of relevant public data common to the top-ranked insurers and the current 29 G-SIBs which are related to interconnectedness and common capital market activities could be a reference in finding a cut-off point from the perspective of regulatory arbitrage considerations. It is also worthwhile to consider historical instances where insurers would likely have been considered as globally systemically important.

(D) Incorporating supervisory judgment and validation

45. The indicator-based approach will be used to provide a first indication of the relative importance of insurers within the scope of the G-SII analysis and also provide a list of G-SII candidates. However, in order to validate the results of this approach, additional analyses will be undertaken.

46. The IFS assessment approach provides an additional business segment specific assessment of the systemic ranking of insurers. This approach supports the indicator-based assessment approach in that it considers the relative systemic risks associated with specific segments of the business portfolio of insurers and applies increasingly higher weights to the segments associated with activities presumed to

present higher systemic risk. In this way, the IFS assessment approach filters out insurers that are large but engaged significantly in traditional insurance or non-insurance industrial activities. The results are then compared to the results from the indicator-based approach to provide a reasonableness check on the results flowing from that approach and form the basis for an informed discussion with the relevant group-wide supervisors and possible further analysis.

47. It is recognised, however, that these approaches will not be sufficient to make a determination as to whether the resulting candidates are in fact systemically important. Additionally explanatory information and analyses may be required, including in cases where both assessment approaches diverge. Such additional information and analysis may be needed, for example, in order to:

- Enhance the understanding of the data flowing into the indicators and produce a more accurate interpretation of the indicator results.
- Reveal extenuating circumstances that cannot be easily quantified in the form of an indicator e.g., a major restructuring or run-off situation.
- Provide information on the extent and nature of risks associated with a particular type of semi-traditional or non-traditional insurance activity and its systemic relevance.
- Provide for an assessment of the liquidity aspects of the insurer's specific products/liabilities and whether such liquidity calls might have systemic implications for the global economy.
- Provide for a more in-depth understanding of the nature and extent of the firm's interconnections with other financial counterparties.
- Provide for a more nuanced assessment of the systemic risk implications of intra-group guarantees and off balance sheet risks.

48. The IAIS will discuss with the relevant group-wide supervisors of each G-SII candidate to obtain their views on the results of the calculations. Based on the assessments, and further informed by their discussions with relevant group-wide supervisors, the IAIS will determine if additional analysis is required. In such cases, the IAIS will seek to obtain additional information from public sources and supervisors.

49. In addition, regardless of the results of the indicator-based and IFS assessment approaches, the IAIS will conduct discussions with relevant supervisors who suggest that an insurer should be added to the list of G-SII candidates.

50. This additional layer of analyses will be conducted in an effective and transparent way. To the extent that such additional inputs alter the results flowing from the indicator-based and IFS assessment approaches, such judgments should be supported by verifiable arguments.

51. It is possible that a particular supervisor or supervisors may challenge the results of the findings of the assessment methodology. In such cases, the IAIS will scrutinise the justification for such arguments.

52. In summary, the IAIS will adhere to the following general principles when incorporating supervisory inputs into the process:

- The bar for judgmental adjustment to the output of the initial quantitative analyses should be high.

- The process should focus on impact to the global financial system of an insurer's failure, not its probability of failure or distress.
- The judgmental overlay should comprise well-documented and verifiable information.

53. The process for incorporating additional inputs would be:

- Collection of the data and supervisory commentary for all insurers in the scope of the data collection,
- Methodical application of the indicator-based approach, supported by the IFS assessment approach,
- For those insurers that are G-SII candidates, discussion with supervisors and additional analyses as may be required,
- IAIS recommendations to FSB on potential G-SIIs, and
- FSB and national authorities, in consultation with the IAIS, drawing on relevant qualitative and quantitative indicators, determining the cohort of any G-SIIs.

III. Policy measures for G-SIIs

54. This section gives early indication of the policy measures which would be applied to G-SIIs, if any insurers are eventually designated as such. A more detailed design of policy measures will be exposed for public consultation later this year and, as already mentioned in paragraph 2, will generally follow the FSB's framework, which includes:

- More intensive and co-ordinated supervision of SIFIs,
- Strengthening the authorities' ability to resolve SIFIs in an orderly manner without destabilising the financial system and exposing the taxpayer to the risk of loss,
- Higher loss absorbency for SIFIs to reflect the greater risks that these institutions pose to the global financial system, and
- Other supplementary prudential measures as determined by the national authorities.

A. Overview

55. The G-SII policy measures should:

- Incentivise insurers to become less systemically important, and give non-G-SIIs strong disincentives from becoming G-SIIs,
- Be linked to the drivers of the G-SII status of each individual insurer. Non-traditional and non-insurance activities and interconnectedness are most likely to be the source of systemic risks and these will need to be appropriately addressed by the G-SII policy measures,
- Reduce the probability of default of G-SIIs and thus reduce the expected systemic impacts which disorderly failure may cause, and

- Reduce the potential for regulatory arbitrage (especially between sectors).

56. The IAIS will provide a number of policy measure options which can be used to reduce the negative externalities stemming from the potential disorderly failure posed by a G-SII.

57. The foundation for G-SII policy measures is the existing IAIS Insurance Core Principles (ICPs). The FSB's "Supervisory Intensity and Effectiveness" recommendations (SIE)[21] would form the basis of the IAIS' approach to enhanced supervision. The FSB's *Key Attributes for Effective Resolution Regimes* (KA)[22] would be the basis for improved resolvability.

58. In addition to enhanced supervision and removal of barriers to orderly resolution, other additional measures would need to be applied to G-SIIs. The IAIS is of the view that structural measures, higher loss absorbency and restrictions on certain activities should be considered. In the next stage of public consultation, a more detailed design of these measurers will be exposed for comment.

B. ICPs, Enhanced supervision (SIE) and Key Attributes (KA)

(A) Enhanced supervision

59. The IAIS approach to enhanced supervision will build on:

- The IAIS ICPs, which are applicable to all insurers and will be the foundation for the G-SII policy measures.
- The IAIS Common Framework for the Supervision of Internationally Active Insurance Groups (ComFrame),[23] which will be applicable to Internationally Active Insurance Groups (IAIGs), whether or not they are identified as G-SIIs, although ComFrame is not expected to directly focus on addressing systemic risk.
- The FSB's SIE, which is applicable to all sectors. The SIE will supplement the IAIS' approach concerning enhanced supervision for G-SIIs.

60. Enhanced supervision of G-SIIs should be supported by the following items, among others:

- Specifically tailored regulation and greater supervisory resources and powers,
- More detailed and frequent reporting, more frequent communication with the Board and Senior Management of insurers,
- Analytical skills for assessing systemic implications, and

[21] See http://www.financialstabilityboard.org/publications/r_111104ee.pdf and http://www.financialstabilityboard.org/publications/r_101101.pdf

[22] See http://www.financialstabilityboard.org/publications/r_111104cc.pdf

[23] ComFrame is the IAIS project to develop a Common Framework for the Supervision of Internationally Active Insurance Groups by 2013, in order to foster group-wide supervision and global convergence of regulatory and supervisory approaches. See http://www.iaisweb.org/Supervisory-Material-765

- A high level of coordination among the relevant supervisors, across sectors and jurisdictions.

(B) Removal of barriers to orderly resolution

61. The FSB's KA apply to all G-SIFIs including G-SIIs and form the basis of the IAIS' approach to improved resolvability. The IAIS is developing its plans for the application of the KA to the insurance sector.

62. It is important for all G-SII home and host jurisdictions to ensure that they have a full range of resolution tools available within their jurisdictions, coordination mechanisms between jurisdictions and the ability to act swiftly. Specific insurance resolution tools such as portfolio transfer and run-off are prime mechanisms to ensure continuation of insurance contracts in the context of the resolution of an insurance legal entity and a group. Policyholder protection facilities or other supporting mechanisms should also be in place.

63. Although the need to react immediately is usually less of an issue with the resolution of insurers the risks posed by a G-SII mean swift actions will be necessary in order to ensure that assets are protected in all affected jurisdictions.

C. Additional measures

(A) Structural measures

64. Examples of structural measures to improve the degree of self-sufficiency of the different business segments are as follows:

- Separate legal structures for traditional insurance and non-traditional/non-insurance activities,
- Restrictions on (cross-)subsidies within a group, e.g. in the form of intra-group transactions (IGT) and funding agreements,
- Disallowance of diversification benefits arising from certain non-traditional/ non-insurance activities in calculating group solvency requirements, and
- Relevant regulation of non-traditional/non-insurance entities.

(B) Higher loss absorbency (HLA)

65. Capital tools are generally already available to many supervisors as a part of a risk-based solvency regime to address the assumed risks of an insurer and to require sufficient capital whether that insurer is systemic or not. However, these capital tools do not specifically address negative externalities to the system.

66. The potential and consistent application of HLA (in particular, including for non-insurance entities and non-traditional insurance activities) will require further consideration by the IAIS. Issues to be considered include, among others:

- The absence of a global solvency standard,
- The nature of the systemic risk drivers and the extent to which they are captured by existing solvency standards, and
- The level of HLA and allowable instruments for meeting HLA requirements.

(C) Restrictions

67. As non-traditional insurance and non-insurance activities are most likely to be the source of systemic risks in the insurance sector, restrictions on such activities would be the most direct way to address them.

68. The preference of the IAIS would be for incentive-based measures over prohibitions. Involved supervisors may choose to limit or prohibit such activities, if necessary and applicable. At the same time, the ability to apply such restrictions will depend on the powers available to each jurisdiction's supervisors and on any amendments to those powers.

(D) Criteria for applying G-SII measures

69. The IAIS also recognises the need to further clarify the criteria for applying the different measures. As noted earlier, any policy measures directed at a G-SII should specifically target the sources of the systemic risk it poses.

D. Timeline

70. The IAIS expects that the G-SII measures would be applied with an 18 month time lag compared to those for G-SIBs due to the different overall timetable concerning the G-SIFI insurance project.

71. For example, this would mean that Recovery and Resolution Plans would be expected to be in place by mid-2014 for G-SIIs compared with the end of 2012 for G-SIBs. Additional measures would be implemented starting from mid-2017 at the earliest.

IV. Future steps

72. The proposed assessment methodology incorporating responses to this consultation will be finalised[24] based on data sets as of year-end 2011 which will be requested shortly after the consultation period of this document. It is planned that the first cohort of G-SIIs, if any, would be designated and subsequently publicised in the first half of 2013 based on the finalised assessment methodology, after a supervisory judgment and validation process. Meanwhile, another public consultation is planned later this year for more detailed proposals on G-SII policy measures.

73. From 2013 onwards, it is intended that relevant data will be collected around the May-June period and a revised G-SII list will be published in November every year. The IAIS does not intend to develop a fixed list of G-SIIs as insurers can migrate in and out of G-SII status over time. This gives insurers incentives to change their risk

[24] The IAIS will continue to monitor developments in regard of G-SIFI assessment approaches in the field of academia or think tanks with a view to possibly improve the IAIS G-SII assessment methodology at an appropriate later stage and/or conduct comparative analyses.

profile and business models in ways that reduce their systemic importance. The scope of data collection will be reviewed every year, so that changes in business structures such as mergers and innovations in products and business activities will be taken into account.

74. For the next data collection, which is planned after the consultation period of this document, instructions and data definitions will be revised. The IAIS commits itself to continue to improve data quality and consistency as well as.

75. With this public consultation the IAIS intends to engage the participating insurers more closely and encourage them to deliver more complete and reliable data so that the use of estimates or approximations can be avoided.

76. The assessment methodology may be revised every three years. Although changing methodology too often will disturb the business planning of insurers, changes in the overall economy and insurance markets should be reflected in the assessment methodology.

Annex – IFS Assessment Approach

A-1 The IFS assessment approach embodies key notions of the *Insurance and Financial Stability* report of the IAIS. It builds on the segmentation of the business portfolio of insurers and insurance-dominated groups and conglomerates into the traditional insurance, semi- and non-traditional insurance activities as well as the non-insurance financial and non-insurance industrial activities as the systemic importance of these business activities spans a spectrum ranging from marginal (in traditional insurance) to considerable (in non-insurance financial activities, e.g. banking).

A-2 In essence the IFS assessment approach segments the business portfolio of an insurer into its traditional insurance, semi- and non-traditional insurance as well as non-insurance financial and industrial activities. Then the assessment approach associates risk weights commensurate with the systemic importance of the business activities of insurance companies. The risk weights are multiplicative factors of total assets broken down along the same segmentation of the business portfolio of an insurance group. The risk weights reflect the IAIS position that systemic importance in insurance is primarily associated with the conduct of non-insurance financial and non-traditional insurance business. Table 2 lists the risk weights under consideration with the insurance business portfolio of insurance companies broken down into its traditional, semi-traditional and non-traditional insurance activities.

INSURANCE Underwriting and supporting investment / treasury functions	Traditional	Semi-traditional	Non-traditional
	2.5%	12.5%	22.5%
NON-INSURANCE Financial activities	100%		
NON-INSURANCE Industrial activities	0%		

Table 2 Risk weights under consideration

A-3 The IFS assessment approach does not assume that traditional insurance business may never gain systemic importance nor compound issues generated in other activities of an insurer. It therefore attracts a low but non-zero weight. At the other end of the spectrum non-insurance financial business attracts a risk weight of 100% which is reflective of the fact that non-insurance financial business is immediately concerned with the payment system, credit intermediation and investment banking / capital markets and related activities, and that it should consequently be treated like banking. Provided that the G-SIFI project is concerned with the identification of global systemically important financial institutions, non-financial industrial activities attract a zero weight.

A-4 The key metric retained to capture the relative importance of any given business segment is total assets broken down along the aforementioned segments. The size

of an operation becomes ever more relevant as the business portfolio of insurance companies shifts from traditional insurance to non-insurance financial activities.

A-5 Only a few key metrics serve as a common yardstick when assessing the business portfolio of insurance companies on a consistent basis. There are even fewer such metrics when insurance groups and conglomerates are to be assessed in relation to each other on a global basis and the metric ought to be as available, reliable and stable as possible. The IAIS settled for total assets after having explored other metrics. Although partly available through segment reporting in annual reports total revenues and break-downs therefore prove too volatile on a year-on-year basis and are tainted by netting effects; also, revenues may not necessarily be reflective of the effective scale of the underlying business.

A-6 Total assets can be determined for all business activities in the portfolio of insurance companies, even though, today, the granularity of annual reports typically stops at segment reporting. To be reflective of the full scale of non-insurance financial as well as semi-traditional and non-traditional insurance business, the break-down of total assets must be adjusted for off-balance-sheet positions including intra-group commitments. Insurance-dominated groups and conglomerates do know well how their total assets are allocated across their business portfolio. If not, they should not be engaged in any operation other than traditional insurance business in the first place. Considering the *Insurance and Financial Stability* report and the IFS assessment approach, the insurance industry should have a genuine interest in advancing their reporting according to the requirements set out.

A-7 The sum of the various multiplications of assets of a given business segment by their respective risk weight add up to a figure referred to as G-SII IFS-score. This can be expressed formulaically as follows:

1.	G-SII-IFS score =				
		a)	2.5%	x	ASSETS (TRADITIONAL)
2.	+		12.5%	x	ASSETS (SEMI-TRADITIONAL)
3.	+		22.5%	x	ASSETS (NON-TRADITIONAL)
4.	+		100.0%	x	ASSETS (NON-INSURANCE-FINANCIAL)
5.	+		0.0%	x	ASSETS (NON-INSURANCE-INDUSTRIAL)

A-8 In the IFS assessment approach insurance companies are ranked according to the result of their G-SII IFS-score.

A-9 Both the indicator-based and the IFS assessment approach are consistent with the concepts expressed in the *Insurance and Financial Stability* paper. The supervisory judgment and validation phase of the overall methodology aims at producing a more robust assessment of the systemic importance of insurers, supporting the results of the indicator-based assessment approach with the segment based IFS assessment approach. The IFS assessment approach does not use indicators as proxies of systemic importance that may potentially fail to cover certain risky activities, but assesses each segment of business comprehensively on its own.