

## Union des Jeunes Assureurs et Réassureurs Français

Speech by Martin Senn Chief Executive Officer November 8, 2013

Mesdames, Messieurs,

C'est un grand plaisir d'être avec vous cet après-midi. Bien qu'originaire de Bâle à la frontière française et de mère française, je ne maîtrise malheureusement pas le français comme je le voudrais. Permettez-moi donc aujourd'hui de m'adresser à vous en anglais.

Today, I would like to talk about the power of insurance to affect real change in our society. History is full with examples of the transformative power of insurance and of its role in enabling and facilitating social progress. It is undeniable, for example, that insurance played a critical role in the industrial revolution in Europe.

To understand how insurance can be a catalyst for a progress we must first recognize that it is a science. This is an important insight as we usually refer to insurance as a business or an industry and fail to see its power as a change-agent. We also view insurance as a single agency, when it is actually comprised of three related technologies.

The first of these technologies is the methodology we use to quantify and price risk.

There are written insurance contracts from Mesopotamia and China providing crop protection that back to 3,000 BC. The first forms of social insurance were devised by the Greeks and the Romans as early as 600 B.C. However, these early forms of insurance were based on intuition and experience rather than analytics and experiment in that they did not necessarily allow for the proper pricing of risk. They consisted either in the pooling of savings that would be redistributed in case of adversity,

or in pure commercial bets that could lead to insolvency and bankruptcy. It wasn't until the period between the 15th and 17th century, that we saw the development of probability calculus that later led to the discovery of the Law of Large Numbers and the foundation of modern statistics.

Only then did the techniques become available to base decisions about the future on analytics rather than bets and beliefs. And with that, another important insight came to the fore: The application of analytics to the assessment of risk allowed for the discovery of the asymmetry between the severity with which the occurrence of a certain risk could hit an individual or a business and the actual likelihood of that risk actually happening. The ability to quantify and price risk and to mediate this asymmetry is what allowed insurance to develop into a viable and reliably solvent business.

It is almost impossible to over-state the importance of that discovery or the critical role it plays in modern-decision making. Actuarial science and statistics allow us to make informed decisions about every aspect of our lives and, potentially, to make the best possible use of our resources.

I qualify the latter clause, ladies and gentlemen, because as I will say later, I do not believe that we are always achieving this goal as too often our priorities are still guided by a relatively narrow and subjective perspective.

The second technology, is the method we use to aggregate, diversify and mutualize risk, what we call risk transformation.

When my company, Zurich Insurance Group, was founded in 1872 it originally provided marine insurance. Without that kind of insurance, the trade boom that began in the 17th century would never have happened. The Americas would never have opened for trade, the great tea clippers would never have set sail to Asia, and the age of progress that followed would never have occurred.

The great fire of Hamburg in 1842, led to the creation of Europe's first reinsurance business, Hamburg Re, as the city's rulers sought to diversify risks outside of the region. That development helped, and continues to help, the rapid urbanization that came on the heels of the Industrial Revolution.

Insurance helps people understand and protect themselves against the risks they face. It empowers them to make decisions in their lives and take action, making it a critical catalyst for innovation and entrepreneurship. And it is a source of stability and personal empowerment.

One emotive modern example of how insurance empowers individuals is slavery. Walk Free, an Australian think-tank, estimates that there are some 29.8 million people living under 'slave-like' conditions in the world today over 4 million more than there were at the height of the global slave trade in 1860.

One of the key reasons for people falling into such conditions is debt. Vulnerable people are frequently driven into the arms of loan sharks and criminal gangs, because of unplanned events in their lives that without the protection of insurance prevent them from securing the means to feed, clothe and house themselves and their families. Unsurprisingly, therefore, there is a strong negative correlation between access to financial services and the incidence of slavery.

This social protection, which we take for granted in developed countries, played a critical role in the social transformation that came in the path of the Industrial Revolution. It helped foster a strong middle class which in turn supported domestic consumption which was a key component of the economic success of developing nations. It helped to erode social inequalities within industrializing societies, which contributed to domestic stability but also to education for all and improved healthcare outcomes which contributed to economic growth.

Governments – as it happens to be increasingly the case also today – were often not in a position to take on the risks themselves and provide this kind of protection. Hence, they allowed this kind of risk protection to be provided by private companies. In so doing, they opened the management of those risks to market forces which in turn created a financial incentive to reduce and mitigate risk. For example, the development of workers' compensation insurance encouraged insurers to become activist in workers' safety initiatives and price safety into their policies.

The third technology of insurance, lies in managing assets relative to liabilities on a risk-adjusted basis.

Put in very simple terms, once an insurer has made the decision to underwrite a risk it then collects the premium and sets aside enough reserves to serve the claims as they occur. These claims occur over extended time periods, often several decades, so insurers need to put these reserves to work to protect these moneys against inflation and to generate earnings to finance the business. At the same time, they need to take a very disciplined approach to investment risk to avoid significant volatility

in their reserves that might leave them unable to meet their capitalization requirements or meet future obligations.

Additional complexity stems from the fact that the risks insurers underwrite may relate to several different geographies, currency areas and even categories of risk with differing sensitivities to external market forces. For example, risks within life insurance may be more sensitive to interest rates while construction insurance may correlate more closely with commodity prices. This is particularly the case if the insurer has an international footprint, or if it covers risks relating to the international activities of companies and individuals.

Asset liability management technology allows insurers to manage these geographic, time, currency, and category variations by continuously matching the assets on their balance sheet against their expected liabilities in given time frames and geographies. This has led insurers, at least the sound ones, to make sure their assets are where their liabilities will be.

And because insurers are private enterprises they have an incentive to put their financial assets to productive use to generate a return. For example, after entering the North American market in the early part of the 20th century Zurich consistently invested reserves relating to North American liabilities in North America.

It is worth noting in this context that insurance companies manage an extremely large amount of money. In 2011, the insurance industry had assets under management of around 24.4 trillion U.S. dollars, making it the second largest investor after pension funds which are also a form of insurance.

In developing economies where bond markets are not yet fully developed, a significant share of the financial assets managed through insures are lying "idle" in cash and term deposits, but in developed economies insurance assets have a long history of funding public projects and enterprise. For example, during the Great Depression Zurich generated premiums from providing surety insurance for projects such as the Hoover Dam, the Golden Gate Bridge, and the Panama Canal, and from providing liability coverage for the 1933-34 Chicago World Fair. At the same time, our company helped provide the financing for the North American railroad and the buildup of the country's electric power infrastructure.

Please note that at the time large infrastructure projects were left to the private sector. It is only later that the state began to play a significant role. As a result, it is only later that insurers started to invest in government debt.

In short, capital requirements and the need to match assets to liabilities while generating a sustainable return provides a strong incentive for insurers to invest in the markets in which they operate. By necessity, insurers are disciplined investors and take a very long-term view, so their participation in the market not only helps to accumulate capital but also contributes to market stability.

I hope by now, ladies and gentlemen, that it is clear that the three technologies of insurance are collectively a strong force for progress, social transformation and growth. They provide the tools for people to guard against risk and empowers them to take informed risks that advance their and our communities' well-being. And they are a stabilizing force in financial markets that stimulate growth and development.

That is unarguably beneficial but as we all know, progress comes at a price. The price of the Industrial Revolution, for example, was a huge rise in pollution. Breakthroughs in healthcare, medicine and agriculture were the catalyst for a surge in global population. When we introduced the automobile, nobody could have foreseen how it would affect our atmosphere, change our society, and create global geopolitical challenges as nations vie for control of dwindling oil supplies. Nor could we have anticipated the terrible toll in road deaths around the world.

Insurers played a role in mitigating these negative consequences, but the process was often slow and occurred in a piecemeal fashion. This is because the industry and society as a whole, understandably only responds to risk factors once they are fully realized and are well understood.

For example, when the Model-T Ford rolled off the production line in 1911, it became the first popularly affordable automobile. It wasn't until the 1920s, however, that auto insurance became mandatory in the United States. The introduction of mandatory insurance, correlates strongly with a sharp decline in road deaths. In 1922, an average of 240 people in the U.S. were killed for every billion road miles traveled. By 1930, following the introduction of car insurance, that figure had dropped to 140. Today the number is below 20 which is still too high but remains a fantastic achievement.

My point is that it took more than a decade to recognize the emerging risk posed by automobiles and for governments to respond. And it took decades more to drive the change in behavior required to mitigate that risk factor.

That response time, may be dangerously slow in the present day. We face enormous global challenges which directly link back to the progress that insurance enabled. These include big issues such as climate change, overpopulation, global aging, and emerging risk factors that we do not fully understand like cyber-risk. We see associated issues, such as global food security, rising crime, and forced immigration. More than anything, however, is the growing complexity and interconnectivity of the risks within our global economy.

Floods in one country can now impact production around the world. Political unrest here pushes up commodity prices there. Where once our world was focused on governing risks within a defined geography, we must now manage a far wider category of risks without frontiers.

Such has been the rate of change within our life-times, that I would argue that the institutions and mechanisms for managing these global risks have failed to keep pace. The global response to issues such as climate change, terrorism, immigration, resource pressure, or even the global economic crisis that followed the collapse of Lehman Brothers in 2008, has been rather fragmented, at times ineffective, and often too slow.

We know that insurance can help address these issues in a number of ways. At Zurich, for example, we are working with international institutions to help foster communities' flood resilience. Flooding, a product of population growth, rapid urbanization, climate change and poor land use, affects more people than all other natural disasters put together. We also see enormous possibilities in telematics, which will contribute to better management of roads and reduced CO2 emissions from transport.

Our industry as a whole, is playing a leading role in developing mechanisms for social inclusion, like micro-insurance, and is a key future investor in technologies to combat climate change and in the infrastructure and tools to respond to emerging issues. Insurers are also playing a role in innovation in areas like Big Data, which will be crucial to formulating our response to future challenges. In future, we will also play an even greater role in helping society manage population aging, by providing sustainable retirement and health insurance solutions. By putting a price to risk, we will create incentives for positive action and disincentives to harmful behaviors, as we have done in the past.

The big question, however, and this brings me to the crux of what I wanted to say to you today, ladies and gentlemen, is whether this will be enough.

In the past, our industry performed admirably, but I fear that as the world grows more complex we will need to respond far more quickly and effectively. That means that as insurers we need to take a more holistic view of global risks from the perspective of all our key stakeholders – our customers, our employees, our shareholders, and the communities in which we live and work. Our industry will need to work in close partnership with and become a trusted advisor to governments and global organizations. We will need to anticipate risks and respond to them at a pace that is unprecedented in history.

So that is my challenge to all of the members of this union of young insurance and reassurance professionals. You are inheriting an industry with a remarkable history of affecting change for the better in our society, but if we are respond to the challenges of the future you will have to be even more innovative, even more creative, than the generations that have come before.

In future, you will have to be governed by a wider understanding of your responsibility to society. Your values and behaviors as individuals will define your contribution to making this world a better place.

You will have to work with a far wider range of counterparties and respond to more rapid changes in the risk landscape. You will need to look beyond borders and view risk in new and unimagined ways. It is an enormous responsibility but also an incredible opportunity for each and every one of you to make a real difference. I have every confidence that you will seize that opportunity.

Mesdames et Messieurs, comme je l'ai dit cet après-midi, notre futur n'est pas sans défis mais les services que nous offrons, les assurances que vous proposez, peuvent aider à faire que ce monde soit plus sûr et à améliorer la vie de nos enfants et des générations à venir.

Tous mes meilleurs vœux de réussite sont avec vous!

Merci pour votre attention.