MARSH

MARSH REPORT | March 2018

Mining Market Update

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MARSH & McLENNAN COMPANIES

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INTRODUCTION

With 2017 now in review, it is clear that the year may herald a degree of change for the mining insurance markets. While the natural catastrophe events of the last quarter are both recent and were clearly important to the results of a range of insurers, the year also saw more subtle events and trends emerge.

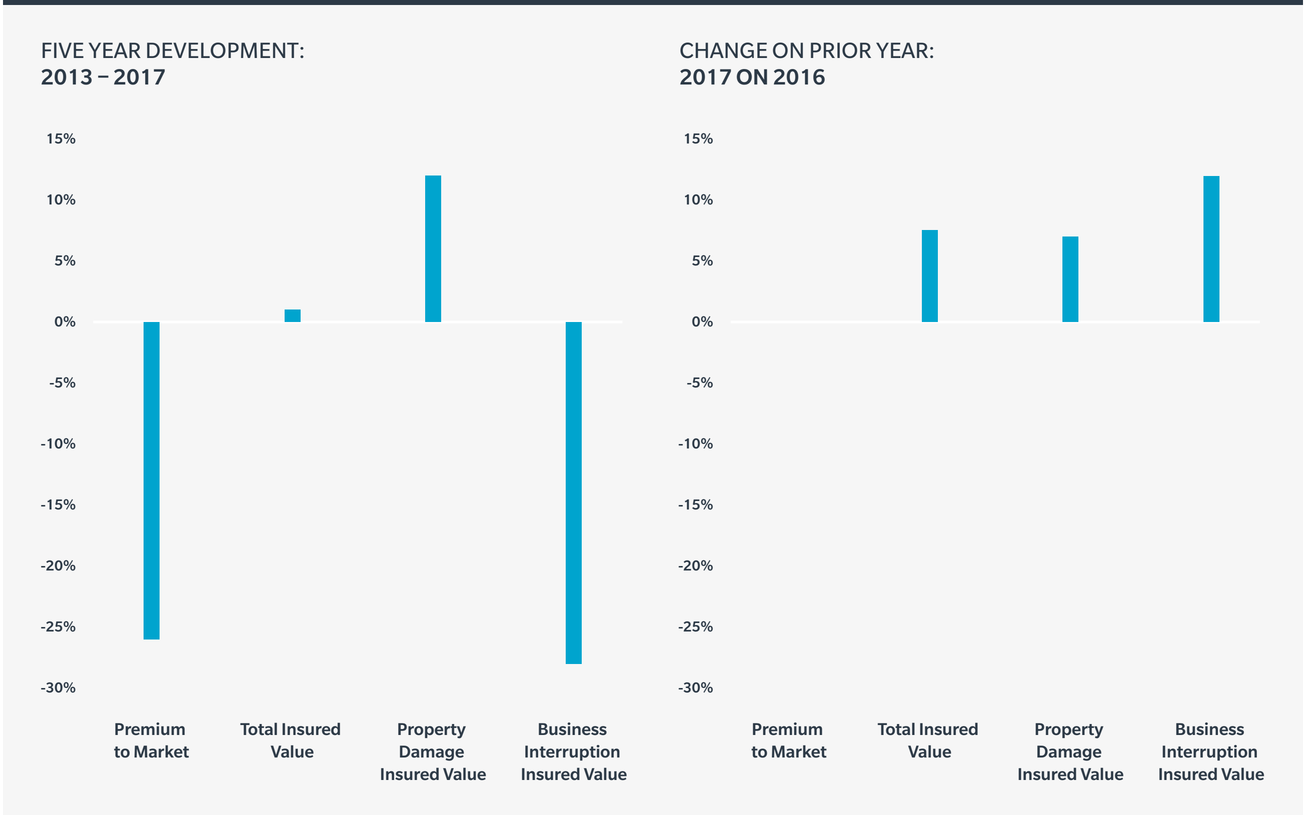
THE TRENDS THAT CONTINUED

- Despite the headwinds created by the 2017 storm season, the average rate paid by Marsh's mining clients* reduced for the fifth consecutive year.
- Property damage and business interruption (PD/BI) premiums collected per annum by insurers for Marsh's mining clients in total have now reduced by more than US$150 million, in the period from 2013 to 2017.
- Meanwhile, property damage sums insured – and total capacity purchased for mining clients – increased by 9% and 12% respectively.

THE TRENDS THAT CHANGED

- For the first time in five years, mining clients and insurers have seen the reversal of the decline in business interruption (BI) sums insured.
- After a reduction in BI insured values of US$60 billion in the four-year period from 2013 to 2016, 2017 saw a year-on-year increase in BI sums insured of US$14 billion.

FIGURE 1 **Insurance Rate Trends**
Source: Marsh Mining Data



* Average rate has been calculated by dividing total physical damage/business interruption (PD/BI) premium for all clients by total PD/BI sums insured for all clients.

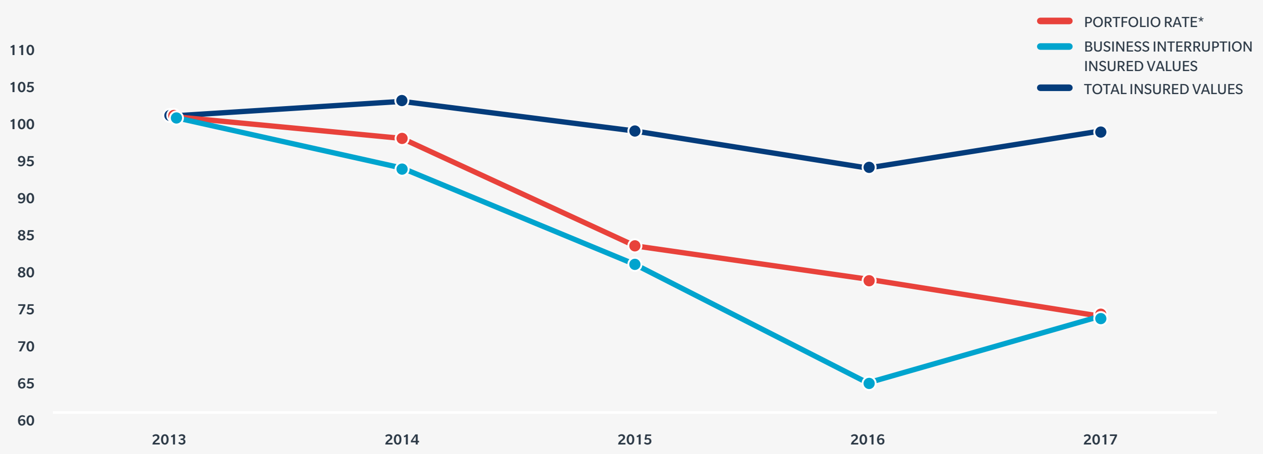
WHAT'S NEXT FOR THE MARKET?

We expect that three key themes will dominate 2018: increases in commodity pricing, insurer discipline as insurers react to catastrophe losses, and broader poor financial results in 2017.

COMMODITY PRICING

Premium paid to insurers has consistently tracked commodity prices lower, as the dollar impact of a given production outage has reduced. Now, the prices of several commodities are enjoying a resurgence, in some cases against a backdrop of supportive government policy initiatives that either reduce supply or stimulate demand (for example, US energy policy, measures to stimulate the adoption of electric vehicles, and the shutdown of less environmentally sound production in China, in particular).

FIGURE 2 Five Year Change: 2017 on 2016
Source: Marsh Mining Data



* Portfolio rate is the average rate for the mining portfolio.

If current positive trends in commodity prices continue, exposure increases alone will allow insurers to grow the top line contribution that the mining sector makes to their books of business.

UNDERWRITER DISCIPLINE

The 2017 storm season, combined with the earthquake in Mexico in September 2017, led to major losses for certain insurers and triggered a marked change in the tone of renewal negotiations in the second half of 2017. It is notable that:

- The loss events led to near immediate management responses from some insurers in late 2017, but will increasingly feed through to direct insurers in the form of increased reinsurance costs in 2018.
- The losses have not fallen evenly upon the market, but create the possibility that those insurers heavily affected – such as Lloyd's and large multinational (re)insurers – may risk a loss of competitiveness relative to those insurers largely (or wholly) unaffected by the event.

While the natural catastrophe (Nat Cat) losses of the third quarter have certainly given the market pause, at this stage the events have triggered a stabilization of the market rather than triggered "hard market" conditions. In the absence of the withdrawal of capacity from the market, we expect stabilization rather than hardening. For example, certain soft market hallmarks are – and will likely remain – less evident. We expect coverage enhancements and changes in retention to attract rate change, with a reduction in program enhancements provided to maintain share. A notable example of heightened underwriter discipline is the scope of write-backs to cyber exclusions, which are no longer an area of increasing flexibility.

INTERNATIONAL PROPERTY MARKET UPDATE

After five consecutive years of rate reductions, the last half of 2017 marked a change in market conditions as the frequency and extent of reductions in rate moderated. At the start of the year, rate reductions at close to double digits remained obtainable where risk quality had demonstrably improved. Reductions in rate are now more moderate as the severity of September's Nat Cat losses works through the market. While the mining sector remained relatively unscathed by either storm or quake events, those with operations in any of the areas affected by the hurricanes through either wind or flood damage are receiving closer attention. Clients with significant exposures in any unaffected Nat Cat-exposed region, particularly those prone to earthquake, have also undergone additional scrutiny as insurers anticipate higher overall reinsurance costs for 2018, and higher costs for Latin American earthquake capacity in particular. While the true impact will emerge through the fullness of 2018, a number of insurers are already attempting to maintain rate increases to address either loss of profitability due to the Nat Cat events, or to recover lost ground following the substantial reductions clients have been able to receive over the past five years.

Lloyd's in particular has been badly affected and the vast majority of insurers are taking a measured approach. Although most clients can expect to discuss pricing, this will vary depending on the quality of the risk and claims experience – in other words accounts continue to be differentiated depending on their risk quality and size, but with greater potential impact.

Obtaining coverage enhancements on a cost-neutral basis is becoming increasingly difficult; reductions in deductible, increases in sub-limits, or any general enhancements in wording, are now attracting more attention.

On top of changing market conditions, careful attention needs to be given to BI sums insured. BI can be priced at two to three times the physical damage rate by certain insurers, meaning that not all insurers will confine rate adjustments to the average program rate where BI has materially increased. This approach is being mitigated somewhat by the size of individual accounts, but does need to be factored in when budgeting for future premium costs.

Overall, although we are experiencing a changing market phase, capacity remains abundantly available and there are no indications of any of the large insurers reducing capacity for mining risks. Indeed, if anything, the choice of insurer has increased, with two Lloyd's syndicates, Canopius and CNA Hardy now writing a specialist mining portfolio and taking lead positions when given the opportunity. The difficult choice for clients will be whether to remain with incumbent markets or look at other available options – as ever, it is this competitive tension that will mitigate pressure for increases in rate.

In Bermuda specifically, insurers have focused pressure for positive rate movement on heavy Nat Cat-exposed risks, especially those in regions affected by recent events. Overall, premiums have increased, largely as a function of increases in insurable values, especially on the BI side which can carry a higher rate. The abundance of capacity has helped curb any unreasonable increases and allows for the movement of capacity and the restructuring of programs in order to generate savings or mitigate increases.

In Europe, there is a definite curtailment in rate reductions being offered to clients, particularly by insurers heavily exposed to last year's Nat Cat events. Clearly the market is attempting to draw a line under further reductions and to seek slight rate increases where BI exposures are increasing. Most European insurers have a consistent appetite for risk participation on existing client accounts. New opportunities continue to be of interest where a good level of information is available and risk quality is generally of a high standard reflecting a proactive approach to risk management.

Information on waste sites and tailings areas (including those not active) remains critical to the underwriting process and influence coverage and capacity, and in rare cases, a refusal to renew.

INTERNATIONAL CASUALTY MARKET

The London casualty insurance market has not been immune to the Nat Cat events of the third quarter of 2017. While not all of these directly affected casualty business, the market has shown increased resolve to resist premium and rate reductions, and is pushing for flat-rate renewals in the mining liability market (and increases in certain other sectors or for specific geographies). Capacity available to the sector remains stable, with both Lloyd's and large insurers maintaining their appetite for mining risks.

As we begin the year, we have not noted any further coverage restrictions in this class, however, clients' previous loss history and geographical spread will be a factor when determining rate. Primary and lead layers will see a greater push to increase rate than excess layers as well as potentially pushing up retentions/deductibles.

Information on waste sites and tailings areas (including those not active) remains critical to the underwriting process and influence coverage and capacity, and in rare cases, a refusal to renew.

US lead umbrella capacity continues to be limited; however, for higher attachment points – in excess of US$50 million – capacity is abundant. Lead umbrella insurers are also offering shorter lead limits of US$15 million (in lieu of US$25 million) with increasing regularity.

During 2017, insurers tended to increase attachments for clients with significant auto liability exposures. Employers' liability remains a concern, and lead insurers typically look for higher attachments when writing lead umbrellas on accounts with significant underground employee exposures, or in higher risk jurisdictions like West Virginia.

The concentration of underground workers is still a concern, and in 2018 insurers will look for information on the use of contract miners and contractors in underground operations.

Likewise, insurers will also likely need more information on impoundments and tailings facilities, requiring engineering and inspection reports to confirm that clients are actively managing these facilities.

Coverage remains stable in key areas – third party liability coverage from sudden and accidental pollution events remains available, while pneumoconiosis and silica-related restrictions are common. However, insurers are increasingly pressing for cyber exposure to be addressed with cyber liability limitations on coverage. Bodily injury and limited property damage exceptions are offered by several insurers.

Underwriters continue to seek additional information on ancillary exposures including rail, marine, and unmanned aircraft.

We've also noted increased interest from clients in punitive damages and terrorism coverage offered under excess liability programs.

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DOMESTIC MARKET CONDITIONS

AUSTRALIA

The Australian property insurance market has undergone a marked shift, with a number of insurers trying to address the profitability of their portfolio following global Nat Cat events. The shift has been focused on price rather than coverage. This change started as a slow and gentle process in 2016, with underwriters focusing on high-risk/high-exposure business, but has been gathering momentum across the market, accelerated by a modest contraction of capacity on general property accounts in the third quarter. Mining accounts with renewal dates in the first half of 2017 would have seen rollover or small decreases in rate, while those with renewal dates in the last quarter would typically have experienced increases. The extent of any increase is generally being determined by loss experience.

While capacity for 2017 renewals remained relatively stable, a number of insurers have reviewed their involvement in coal with a particular focus on thermal coal. A contraction in capacity for coal accounts will be compounded if commodity price increases are maintained throughout 2018 and clients require higher limits as a consequence.

There is an increased focus on Nat Cat exposures and contingent (for example, off-premises) BI exposures are being reviewed very carefully. Several insurers are also seeking verification for some of the sub-limits and coverages that have been negotiated during a softer market (for example, flooding of open pits, haul roads, etc.). Clients should undertake appropriate modeling to understand the aggregate exposure and ensure their business continuity plans are in place and documented to underwriters to support the continued provision of such aspects of coverage.

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In contrast to the property market, the liability market continues to offer stable buying conditions for clients, with the exception of clients that have experienced an increase in the frequency or severity of losses, particularly worker-to-worker (contractor) claims – a low number of losses can still significantly impact the loss ratio.

As 2018 progresses we expect to see typical property rate increases in double digits, with increased scrutiny and potential reduction in capacity for accounts with adverse loss histories or natural catastrophe exposures. For liability risks we expect the rollover of terms except where claims would dictate otherwise.

CANADA

Canadian insurers are showing signs that historic premium trends are unsustainable. In the property space, funding losses from a reduced premium pool has become increasingly challenging, and we have seen a discreet change in market behavior beginning in October 2017. Property market capacity, however, remains abundant, allowing the management of rate change. The liability market is following the property trend as loss events impacted earnings for the carriers as a whole. Publicly traded mining companies are also seeing a tightening of the domestic directors and officers (D&O) liability marketplace with pressures on both premium and retentions.

Although there is a lot of noise around the impact of the 2017 Nat Cat events, impact to date has been minimal and domestic loss ratios haven't been as greatly impacted as certain global multinational insurers. Insurers that have been affected have typically mandated renewal rate increases, while those less impacted might still offer flat rate, or in rare cases very modest rate reduction, renewal terms for claims-free, well risk-managed clients. Risks with US, Caribbean, or South American Cat exposure (earthquake, windstorm) face particular rating pressures. Compounding the effect of rate increases are BI value increases for some companies as the commodity price environment improves.

There remains sufficient capacity to completely re-market property placements with lower limits, while higher limit programs might see portions of their incumbent insurer lineup changed to meet renewal goals.

For Canadian liability markets which are trying to recover losses across other lines, client outcomes generally comprise flat rate renewals. Underwriting continues to focus heavily on tailings risk due diligence.

The Canadian D&O marketplace is tightening for mining risks, especially those with US stock exchange listings and/or a significant claims history. Mining is a significant component of Canada's large cap sector. This, combined with the susceptibility of mining companies to claims based on alleged misrepresentation, means that the Canadian D&O insurance market has seen significant claims activity. During 2015-2016, the Canadian D&O marketplace paid out in excess of CAD$300 million in losses on behalf of mining companies, and a number of large value class actions remain unresolved.

This has significantly impacted pricing for larger mining companies, especially, those with US listings and/or claims. Companies with excellent risk profiles can expect pricing to increase by 5%-10%. Companies with more difficult risk profiles can expect increases of up to 30%. Despite premium pressures, capacity remains abundant and terms are generally positive. One area under significant pressure is deductibles, with insurers putting pressure on retention increases on small cap and large cap companies.

For public companies listed on one of the Canadian exchanges and not a US exchange, the market remains positive while showing some signs of tighter conditions ahead. Coverage can generally be obtained in the desired amount and on desired terms. Some insurers that have traditionally strongly supported the sector are attempting to reduce limits on individual accounts, typically trying to reduce CAD$15 million limits to CAD$10 million. However, there is little difficulty in replacing this capacity with acceptable alternate insurers.

SOUTH AFRICA

The South African insurance market continues to be challenging, triggered by a particularly severe domestic general property claims record as a consequence of wild fires, storm events, and major fires. As a consequence, solvency margins remain tight and credit ratings under watch. Domestic insurers in the South African marketplace remain under strain as an increasing share of South African mining risks is being placed in the London market. Local insurers have pressed hard to increase rates, tighten wordings, and one particular delegated underwriting authority market with a formerly aggressive strategy has provided mid-term notice of cancellation and non-renewal as the market attempts to implement more favorable terms and conditions. Risk quality remains the defining factor for market outcome, as clients with demonstrably strong risk management programs and clean loss records maintain unaltered rates.

LATIN AMERICA

BRAZIL

In Brazil, conditions for mining clients have improved, with typically stronger returns, increased merger and acquisition activity, and the approval of a new mining code. The insurance market, however, has shown no increase in positivity towards the mining sector, with domestic Brazilian property and liability insurance markets continuing the trend of coverage limitation and rate increase. The international reinsurance markets are now integral to the completion of meaningful mining placements in Brazil as insurers tightly control the terms and conditions on which they will deploy capacity to the sector.

CHILE

The earthquake exposure of Chilean mining risks means that the domestic property insurance market has become fully dependent on the support of international capacity. Soft market conditions continued to prevail in the first half of 2017, with abundant reinsurance capacity available at very competitive prices in comparison to historic norms. In the second half of the year however, market conditions changed dramatically as a result of insurers' negative financial results and the increasing costs of catastrophe capacity. Recent renewals have seen moderate rate increases, and in some cases increases in deductibles.

As well as being particularly exposed to change in earthquake capacity prices, Chile is also particularly exposed to copper, which has performed relatively strongly in 2017. As the copper price has strengthened, BI rates have followed suit and capacity with further reductions in rate has become more difficult to source. Certain reinsurers have sought to include copper price caps, although our preferred solution remains to limit any given insurer's exposure by loss limit or capacity deployed only. Local insurers have followed this trend but are less aggressive than the international facultative market, and we can expect that this trend will continue in 2018.

The Chilean casualty insurance market remains in a soft cycle, with aggressive competition between local and international insurers. Critical information about waste sites and tailing areas is still very much at the forefront of the market's underwriting process. Employers' liability and pollution and contamination coverage continues to be an area of focus and the sub-limits in relation to this cover have been increasing.

UNITED STATES

Commodity price improvements and stabilizing levels of debt have in general allowed an improvement in health for the US mining industry in 2017. Mining companies are operating on a cash-flow-positive basis and the majority of companies that were in bankruptcy in 2016 have returned to operations.

In line with the global norm, property rates flattened out in the last quarter of 2017 with markets no longer willing to provide rate reductions. Fourth quarter renewals saw the market holding rates generally flat with some rate increases (in the region of 3.0% – 7.5%).

Despite common insurer desire to hold rate and in some cases look to increase, ample capacity is available allowing clients options to reallocate capacity and minimize the effect of a specific insurer's pricing strategy. Approximately US$200 million - $250 million of underground capacity and US$1 billion of surface capacity remains available for US hard and soft rock producers.

With the exception of specific circumstances, rate pressure is not accompanied by change in coverage restrictions or exclusions, and existing policy forms are being renewed without issue, with some acceptance of broader manuscript policy language by the market.

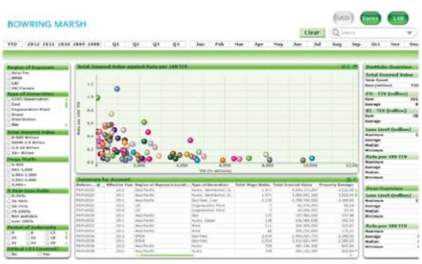
RISK ANALYSIS MODELLING PLATFORM (RAMP)

The size and diversity of our global portfolio has enabled us to develop a market-leading Risk Analysis Modelling Platform. This helps us benchmark property damage and business interruption insurance programs and develop confidential, tailored reports for clients.

Using data points such as critical catastrophes, deductibles, key sub-limits, loss limits, loss ratios, principal ores, and types of risk (open pit or underground), we can provide important in-depth management information on a confidential basis.

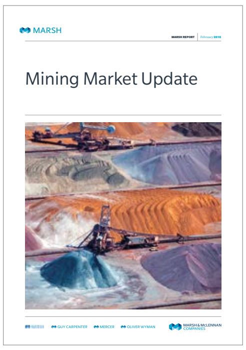
FEATURES AND BENEFITS OF THE RISK ANALYSIS MODELLING PLATFORM

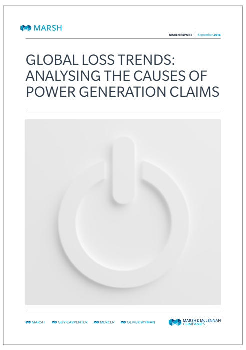
FEATURE	BENEFIT
Consolidated global database providing historical rates, limits, deductibles, and program structures.	A clear visual representation of how any insurance program compares to that of others in the same industry.
Access to terms and conditions offered by both local and international markets.	The ability to compare local programs (in the same region as the insured) to those available from international markets.
Provision of real time average and median rate analysis for any given timeframe (for example, comparing specified quarters and/or years).	The ability to provide quick "ballpark" estimates for either new or renewing business based on historical trends.
Quality printed output.	Aids executive decision-making.
Historical record of renewals for clients.	Enables elements of premium increases/decreases for divestitures/acquisitions.



THOUGHT LEADERSHIP

Marsh uses the combined knowledge and experience of our brokers and our proprietary claims data to provide regular, thought-provoking, industry-focused research papers for clients.





SPOTLIGHT

THE BOWRING MARSH ADVANTAGE

With the size of our portfolio and our global network of Bowring Marsh offices, we can offer a real advantage to clients who are in need of an international placement solution. Some of our attributes, which we live by and share, include:

- Our energy.
- Our enthusiasm.
- Our global network.
- Our industry and technical knowledge.
- Our ability to have face-to-face negotiations with decision makers.
- Our proprietary facilities.
- Our Risk Analysis Modelling Platform.
- The results from our 2016 underwriter survey.

BOWRING MARSH FACILITIES

Bowring Marsh offers specially negotiated facilities, specifically for mining clients, which facilitate the speedier quotation and placement of client risks.

MINING FACILITY	Offers more than US$23 million in capacity and writes all mining activities without exclusion – including underground, which can be difficult to place. It brings in new quality Lloyd's capacity and covers all perils without exclusion – including natural catastrophe.
QBE PROPERTY FACILITY	Offers up to US$80 million capacity for international exposures or up to $US50 million for US exposures, using superior A+ rated security.
TERRORISM AND POLITICAL VIOLENCE FACILITY	Offers long-term pricing stability and up to 50% of each slip with a discount of 10% off the lead market premium.
UK TERRORISM FACILITY	Jointly led by Talbot Syndicate 1183 and Brit Syndicate 2987 and backed by other Lloyd's insurers, offers GBP250 million loss limit per insured available, with quick turnaround times and a broader definition of an act of terrorism when compared with Pool Re.

Detailed information on the above facilities is available from your usual Bowring Marsh contact, or from fleur.giraud@marsh.com.

About Marsh

Marsh is a global leader in insurance broking and innovative risk management solutions. In more than 130 countries, our experts help clients to anticipate, quantify, and more fully understand the range of risks they face. In today's increasingly uncertain global business environment, Marsh helps clients to thrive and survive.

We work with clients of all sizes to define, design, and deliver innovative solutions to better quantify and manage risk. To every client interaction we bring a powerful combination of deep intellectual capital, industry-specific expertise, global experience, and collaboration. We offer risk management, risk consulting, insurance broking, alternative risk financing, and insurance program management services.

Since 1871 clients have relied on Marsh for trusted advice, to represent their interests in the marketplace, make sense of an increasingly complex world, and help turn risks into new opportunities for growth. Our more than 30,000 colleagues work on behalf of our clients, who are enterprises of all sizes in every industry, and include businesses, government entities, multinational organisations, and individuals around the world.

We are a wholly owned subsidiary of Marsh & McLennan Companies (NYSE: MMC), the leading global professional services firm in the areas of risk, strategy and people. With 65,000 colleagues worldwide and annual revenue exceeding $14 billion, Marsh & McLennan Companies also include global leaders Guy Carpenter, Mercer, and Oliver Wyman.

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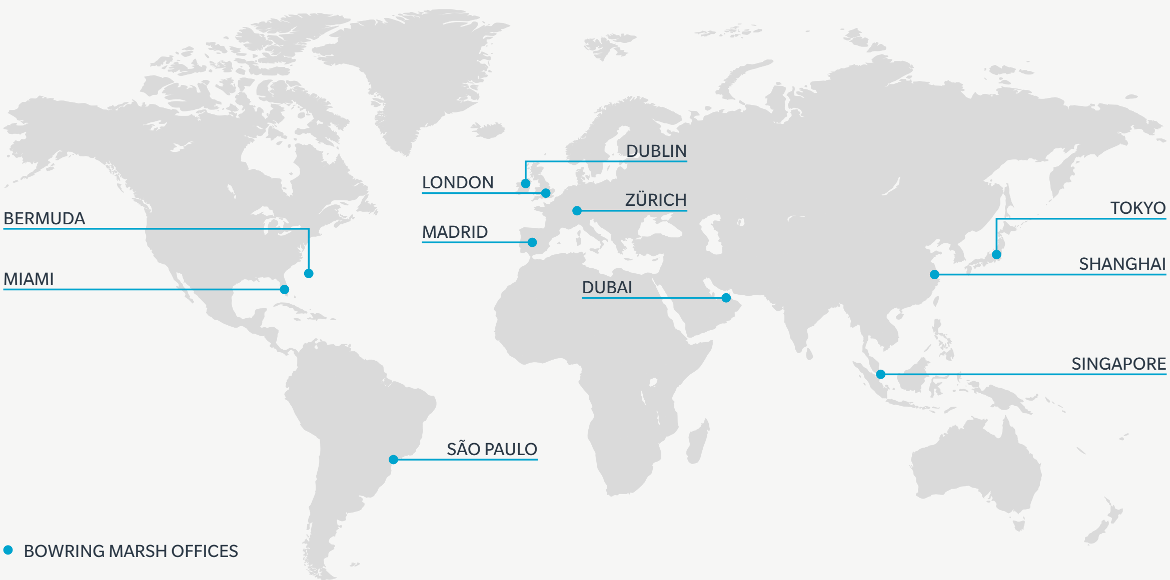
With more than 300 insurance brokers located across all the major international insurance hubs, Bowring Marsh provides international placement options that suit your business risk and exposures. We use our comprehensive portfolio experience, our in-depth knowledge of your risks, our ability to have face-to-face negotiations with decision makers, and our industry knowledge to innovate, customise, design, and place your insurance programs with international insurers.



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