

2010

## The BP Oil Spill and Australia ... Is There a Connection?

Tina Hunter

*Bond University*, [tina\\_hunter@bond.edu.au](mailto:tina_hunter@bond.edu.au)

Follow this and additional works at: <http://epublications.bond.edu.au/nle>

---

### Recommended Citation

Hunter, Tina (2010) "The BP Oil Spill and Australia ... Is There a Connection?," *The National Legal Eagle*: Vol. 16: Iss. 2, Article 3.  
Available at: <http://epublications.bond.edu.au/nle/vol16/iss2/3>

This Journal Article is brought to you by the Faculty of Law at [ePublications@bond](mailto:ePublications@bond). It has been accepted for inclusion in The National Legal Eagle by an authorized administrator of [ePublications@bond](mailto:ePublications@bond). For more information, please contact [Bond University's Repository Coordinator](#).

# The BP Oil Spill and Australia...Is There a Connection?

**Assistant Professor  
Tina Hunter  
Faculty of Law  
Bond University**

## Introduction

We have all heard about the terrible Deepwater Horizon oil spill in the Gulf of Mexico. The oil company BP has been held responsible. Lots of birds have died, and thousands of other birds have been oiled as a result. In addition, the livelihood of thousands of people in the Gulf States, particularly Louisiana, Mississippi and Alabama, have been destroyed, since there is no longer the ability to fish from the Gulf. This has flow on effects into many areas of the US economy that has already been battered by the Global Financial Crisis. But what you may not know is that there are a number of connections between the BP oil spill in the Gulf of Mexico and an oil spill on the Montara Platform that occurred in August 2009 off the coast of Western Australia. There are many similarities between the two spills. This article will discuss some of these similarities, as well as looking at how we can use the law to assist in preventing oil spills, or if they do occur, how we can lessen the effects of the spills.

## The Deepwater Horizon spill in the Gulf of Mexico

Deepwater Horizon refers to the drilling platform (also known as a drilling rig) that was used by BP to drill an oil exploration well in the Gulf of Mexico in almost 2000m of water in the Macondo field (you might also hear the incident called the Macondo spill).

### What Happened and what went wrong?

While drilling the exploration well on 20 April 2010, a large amount of methane gas suddenly shot up the exploration well, sort of like an uncontrolled burp (we call it a 'kick'). It came all the way up, and expanded onto the platform where dozens of men were working. This gas was then ignited (probably by a spark that came from metal tools hitting a pipe, or similar metal on metal contact) and a fireball erupted. While many men were evacuated off the platform with lifeboats, 11 men did not get off the platform, and subsequently died.<sup>1</sup>

The fireball explosion caused the oil platform to sink, and as it sunk, it tore the pipe that connected the well to the platform, leaving it broken in three places. At the site where the pipe broke off from the well head, the pipe began leaking large amounts of oil. This oil leaked at an initial rate of about 20,000 litres per day, rising to a rate of about 1 million litres a day,<sup>2</sup> until the leaking well was finally capped on 4 August

2010 by the use of drilling mud and cement.<sup>3</sup> It is estimated that in total over one billion litres of oil leaked from the Deepwater Horizon well.<sup>4</sup>

The biggest question that was on everyone's lips was what went wrong that enabled the oil spill to occur? The simple answer to this is that there was a failure of a valve, called the Blow-Out Preventer (BOP), which should have stopped the gas rushing up like an uncontrolled burp. The BOP is a little like a lid on a bottle of Coke. Imagine if you shook up a bottle of Coke with the lid on, and then released the cap in one swift motion. The result – an explosive outpouring of Coke everywhere, as the gas in the Coke expands as it rushes through the opening. Now imagine the same scenario, except instead of taking the lid off in one go, opening the lid of the coke slowly and incrementally. What happens? The gas in the Coke expands slowly in a controlled environment, and dissipates harmlessly, without spilling Coke all over you. This is what the BOP is supposed to do – control the release of the gas, slowly dissipating it so that the men above are not injured or killed. Yet the valve failed in the Deepwater Horizon well.

The exact reason for the cause of the failure of the BOP is unknown, and much media attention in the aftermath of the spill focussed on three main players. Firstly was BP, the oil company, responsible for the well (known as the operator). Then there is Transocean, the company that owned and operated the drilling rig that exploded and sunk. And finally there is Halliburton (yep, the same company that supplies french fries to the armed forces in Iraq), the company that cemented the well into place. While the cause of the spill is not clear (although all will be revealed in the Government Inquiry), it is thought to be related to the way the well was kept in place on the ocean floor. Oil wells are cemented into the floor of the ocean, similar to how a fence or veranda post is cemented in. However, when there is a mistake in cementing the well (or a post), gas gets into places that it is not supposed to, and methods to prevent gas escaping do not work. In Deepwater Horizon, there is evidence that the cementing of the well by Halliburton was not done to the correct standard, and may have been defective.<sup>5</sup> This enabled natural gas to enter the well pipe, and the BOP was unable to control the gas, resulting in the massive gas leak and subsequent explosion.

## What was the result?

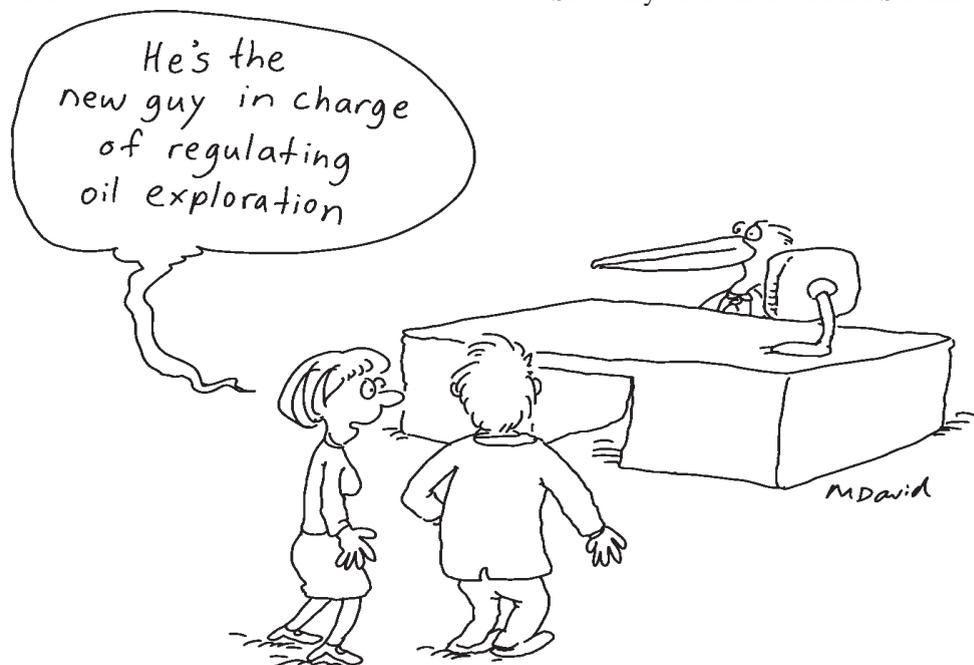
The result of the spill was truly devastating. Those in your parent's generation were haunted by images of the Exxon Valdez oil spill in Prince Edward Sound in 1989. In that disaster approximately 90 million litres of oil spilled into a pristine area of Alaska, as a result of a ship, the *Exxon Valdez*, running aground on Blight Reef. While not the largest spill by volume, the devastation of the Exxon Valdez spill was its effect on wildlife and fisheries in Prince William Sound. The Deepwater Horizon spill exceeded the volume of the Exxon Valdez spill fivefold, as well as the devastation of fisheries, and the livelihood of tens of thousands of people.

By the end of July 2010, over 900km of shoreline had been covered in oil, and over seventy thousand square kilometres of fishing grounds closed by the middle of July 2010, representing over 35% of all fishery areas of the Gulf of Mexico. In addition, thousands of wildlife had died or been debilitated, and their natural habitat destroyed.

## Oil spills and the law

So where does the law fit into all of this? The law regulates all of the activities surrounding oil, including the drilling of wells, the type of valve, the type of lifeboats for the men on the platform, and even the type of well you can drill. For the Gulf of Mexico the oil activities were being regulated by the Minerals Management Service, a division of the US Department of the Interior.<sup>6</sup> After the Deepwater Horizon oil spill occurred, there has been much criticism of the Minerals Management Service, and the way it regulated (or failed to regulate) oil wells and oil platforms in the Gulf of Mexico. Some of these criticisms included a lack of inspection, failure to require proper well permits, and failure to insist on a second, 'last resort,' BOP for the well.<sup>7</sup> There has been some argument that if the inspection of wells and the implementation of required regulations were adhered to, then the Deepwater Horizon spill may not have happened.

The mismanagement of offshore oil and gas operations was seen to be so severe that the US Department of the Interior introduced reforms to safety and environmental protection relating to oil and gas operations, and also reformed the laws relating to oil spills. As noted by the Secretary of the interior Ken Salazar:



We have been – and will continue to be – aggressive in our response to BP’s spill, but we must also aggressively expand the activities, resources, and independence of federal inspectors so they can ensure that offshore oil and gas operations are following the law, protecting their workers, and guarding against the type of disaster that happened on the *Deepwater Horizon*.<sup>8</sup>

Since the Deepwater Horizon spill, the US government announced that it would reorganise the Minerals Management Service into three separate divisions, and rename it the Bureau of Ocean Energy Management, Regulation and Enforcement. This Bureau will manage the oil and gas leases and permits, while the Office of Natural Resources Revenue will attend to revenue collection and enforcement. In addition, a newly established safety and environment body, the Bureau of Safety and Environmental enforcement, will oversee all safety and environmental aspects of offshore oil and gas operations.<sup>9</sup> In addition, the Secretary of the Interior has outlined many reforms in the regulation of offshore oil and gas facilities including:

- Additional Resources for Federal Inspectors - the oil spill response legislation that the Obama Administration has submitted to Congress proposes an additional \$29 million for inspections, enforcement, studies and other activities. This includes approximately \$20 million for increased inspections of other platforms, engineering studies, and enforcement of safety regulations for other offshore platforms, another \$7 million for more comprehensive evaluations of policies, procedures and actions that may be needed in light of the Deepwater Horizon incident, and \$2 million for the Fish and Wildlife Service, U.S. Geological Survey or others to conduct general environmental studies.
- Independent Investigation by the National Academy of Engineering – at the request of the Obama Administration, the National Academy of Engineering will conduct an independent, technical investigation to determine the root causes of the Deepwater Horizon disaster so that corrective steps can be taken to address the mechanical failures underlying the accident.
- Expanded Authority to Review Exploration Plans – oil spill response legislation submitted to Congress proposes to eliminate a 30-day congressionally-mandated deadline for the Bureau of Ocean Energy Management (BOEM) to act on exploration plans that oil and gas companies submit. Changing this 30-day mandatory deadline to a 90-day timeline that can be further extended to complete environmental and safety reviews, as needed, would provide BOEM more time to conduct additional environmental analysis on an exploration plan when required.<sup>10</sup>

The Deepwater Horizon oil spill has caused the United States government to closely examine how it regulates oil and gas activities offshore, in the Gulf of Mexico. But how does that relate to Australia?

## The Montara Spill in Western Australia

Before the world had experienced the Deepwater Horizon oil spill, Australia was battling its very own oil spill – the worst of its kind in Australian offshore oil history.

The Montara spill occurred on an oil rig in the Timor Sea off the northern coast of Western Australia near Christmas

Island. While both spills occurred offshore, the Montara spill occurred in a remote area (it was 690km west of Darwin). Like the Deepwater Horizon spill, the oil moved in a northwest pattern, however rather than moving toward the Australian coast, it moved toward the Timor coast.

### What happened and what went wrong?

In the early hours of the morning on 21 August 2009 there was an uncontrolled release of gas from the Montara Well.<sup>11</sup> This release subsided, although bubbles were seen and heard in the water. Another release of gas, this time mixed with oil, occurred at around 7.30 on the same day, and contained a mix of unignited oil and gas.<sup>12</sup> Soon after, the rig was abandoned since safety was compromised due to the presence of the gases.<sup>13</sup> Oil began spilling from the well, at a rate that has been variously reported, but officially recognised as 64,000 litres per day.<sup>14</sup> Whilst this does not seem like much oil spilt, particularly in relation to the BP oil spill, it becomes large when you factor into account that the spill continued for 74 days unabated. This means that a total of approximately 4.74 million litres of oil spilled out into the Timor Sea.

As a result of the westward flow of oil from the Montara oil spill, the oil did not reach the coast. Furthermore, Australia was lucky since the spill occurred in an area that was not a rich fishing area in Australia. Therefore no oil reached the Australian coast, and no fishery areas in Australian waters were affected. There has been reports of the oil reaching the coast of Timor, affecting the fisheries in the Timor Coastal areas, however this is still pending the outcome of the Montara Commission of Inquiry (more about that later).

### Similarities between the Montara oil spill and the Deepwater Horizon spill

There are a number of similarities between the Deepwater Horizon and the Montara oil spills, aside from the fact that oil spilled out from an underwater oil well. Both oil spill incidents involved explosions and fires, a very common occurrence when dealing with highly flammable oil and gas (that is why you should never smoke around petrol or gas... it tends to ignite). While the Deepwater Horizon spill was the result of a huge gas explosion that killed nine people, Australia was fortunate in that no lives were lost in the Montara spill. When the spill occurred, the oil rig was evacuated immediately, and no explosion occurred. It was only when the oil well was capped months later that somehow the empty oil rig caught fire, totally destroying the rig without loss of life. The cause of the fire is also subject to the Montara Inquiry.

Each spill went on for a long time, months in fact. The Deepwater Horizon spill was almost three months, while the Montara spill was almost 10 weeks. The reason for the long period of time is related to the difficulty of capping an oil well. In the case of the Deepwater Horizon spill, it was because the well was very deep (over 2000m), and the well pipes had been damaged due to the explosion and sinking of the oil platform. In the case of Montara, the spill took 10 weeks to cap because the National Offshore Petroleum Safety Authority (NOPSA) excluded all ships (including a second drilling vessel) from entering the area around the Montara well for a radius of two nautical miles (that is about 3.7km). That means that ships were not able to try and cap the well like BP was able to finally do in the BP oil spill. Instead, the Montara well had to be plugged by drilling a

relief well (kind of like a side well) from 4km away...that is like trying to thread a needle when the cotton is in the other room...very difficult.

Another similarity between the Montara oil spill and the BP oil spill is the cause. In both instances, the cementing of the well to stabilise and seal off the well has been called into question. More importantly, the cementing of the well was done by the same company, Halliburton. This raises serious questions about whether the cementing methods that are being used are the best practice. In fact Elmer P Danenberger, who used to be a manager at the Minerals Management Service in the USA, raised serious reservations about the methods used to cement wells and control wells in the offshore oil industry in general.<sup>15</sup> Similar to the Deepwater Horizon spill, evidence given at the Montara Commission of Inquiry indicated that the Montara well did not comply with the internal standards of the drilling company, PTTEP, let alone the regulatory requirements.

Perhaps the greatest similarity between Montara and the Deepwater Horizon spill, has been the deficiencies in the regulation of oil and gas activities. Even before an official inquiry has been conducted into the BP oil spill, the US Senate has spent immeasurable hours interviewing regulators, the company and other relevant people, live in front of the whole country, and telecast on C-Span (to watch any of this just search for Deepwater Horizon spill and US Senate on YouTube, and you will find an enormous amount of video clips, including evidence given by Elmer P Danenberger). Furthermore, the US has already reorganised the management framework of offshore oil and gas in the Gulf of Mexico, establishing new safety and regulatory bodies. Similarly, there has been regulatory fallout in Australia. A Commission of Inquiry was established in November 2010, which not only sought submissions from companies, governments and the public, but also conducted hearings in March and April 2010. The report from the Montara Commission of Inquiry was handed to the Australian government in June 2010, although at the time of writing of this article the report had still not been released, possibly due to the pending federal election. While the report findings have not been made official, the Australian Government has signalled that there will be many changes to the regulation of offshore oil and gas activities, similar to the changes that have already been made in the US. First on the list for the government is a new regulatory authority, which may include a separate safety and environment authority.<sup>16</sup> It will also result in changes to practices of the oil and gas industry, to ensure that these sort of events are less likely to happen in the future.<sup>17</sup>

## Conclusion

The BP and Montara oil spills have highlighted a number of things. First, they highlight the terrible damage that can occur when oil spills occur, and the source of the spill is unable to be stopped. More importantly, from a legal point of view, each of the spills have highlighted that the regulation in place was inadequate and needs to be changed. It is through a review of the legal regulation of oil and gas activities after events such as these spills we reform the law to ensure that the regulation of oil and gas activities is safer for people and the environment. While these two events have been terrible, and the outcomes will last for generations to come, hopefully they will also assist, through law reform, to lessen the chances of such events happening again.

## References

- <sup>1</sup> Rick Jervis, 'At least 11 Workers Missing After Louisiana Oil rig Explosion' (2010) *USA Today* (21 April 2010).
- <sup>2</sup> The amount of oil leaking varies wildly, but official estimates from the US Department of Interior place the spill at between 1 million and 1.5 million gallons a day, which equates to about 4 million litres per day.
- <sup>3</sup> Campbell Robertson 'Estimates Suggest Spill Is Biggest in U.S. History' *The New York Times* (The New York Times Company) retrieved 27 May 2010.
- <sup>4</sup> Campbell Robertson and Clifford Kraus, 'Gulf Spill the Largest of its Kind Scientists Say' *The New York Times* (2 August 2010).
- <sup>5</sup> Jim Efstathiou Jr, 'BP, Halliburton, Transocean Blame Each Other in Gulf Oil Spill' (2010) *Bloomberg Businessweek* (4 May 2010) <http://www.businessweek.com/news/2010-05-10/bp-halliburton-transocean-blame-each-other-in-gulf-oil-spill.html> at 10 August 2010.
- <sup>6</sup> Bureau of Ocean Energy Management, Regulation and Enforcement, *History of Minerals Management Service* (2010) <http://www.boemre.gov/ooc/newweb/brochures/MMSOverview.pdf> at 12 August 2010.
- <sup>7</sup> Richard S. Dunham and Stewart Powell 'Critics Blame Energy Lobby for Lax Safety Rules', *Houston Chronicle* (9 May 2010).
- <sup>8</sup> US Department of the Interior, *Media Release: Salazar Launches Safety and Environmental Protection Reforms to Toughen Oversight of Offshore Oil and Gas Operations* (2010) <http://www.doi.gov/news/pressreleases/Salazar-Launches-Safety-and-Environmental-Protection-Reforms-to-Toughen-Oversight-of-Offshore-Oil-and-Gas-Operations.cfm> at 10 August 2010.
- <sup>9</sup> US Department of the Interior, *ibid.*
- <sup>10</sup> US Department of the Interior, *ibid.*
- <sup>11</sup> PTTEPAA, *PTTEPAA: Submission to Commission of Inquiry, Montara Well Head Platform Uncontrolled Hydrocarbon Release TRI (Submission No SUBM.1000.0001.0041)* (2010) [81].
- <sup>12</sup> PTTEPAA, *PTTEPAA: Submission to Commission of Inquiry, Montara Well Head Platform Uncontrolled Hydrocarbon Release TRI (Submission No SUBM.1000.0001.0041)* (2010) [84].
- <sup>13</sup> PTTEPAA, *PTTEPAA: Submission to Commission of Inquiry, Montara Well Head Platform Uncontrolled Hydrocarbon Release TRI (Submission No SUBM.1000.0001.0041)* (2010) [84].
- <sup>14</sup> This is officially reported as 64 tonnes per day, which equals 64,000 litres per day: Australian Maritime Safety Authority, *Major Oil Spills in Australia* (2010) [http://www.amsa.gov.au/Marine\\_Environment\\_Protection/Major\\_Oil\\_Spills\\_in\\_Australia/](http://www.amsa.gov.au/Marine_Environment_Protection/Major_Oil_Spills_in_Australia/) at 11 August 2010.
- <sup>15</sup> Elmer P Danenberger, *Submission to Commission of Inquiry, Montara Well Head Platform Uncontrolled Hydrocarbon Release TRI (Submission No SUBM.6007.0001.0041)* <http://www.montarainquiry.gov.au/downloads/SUBM.6007.0001.0001.pdf> at 10 August 2010, 1.
- <sup>16</sup> 'Ferguson Calls for Offshore Regulator' (2010) *Business Speculator* <http://www.businessspectator.com.au/bs.nsf/Article/Offshore-oil-regulator-needed-Ferguson-88563?opendocument&src=rss> at 11 August 2010.
- <sup>17</sup> 'Australian Oil Industry Acting on Lessons of Montara Spill' (2010) *Platts* <http://www.platts.com/RSSFeedDetailedNews.aspx?xmlpath=RSSFeed/HeadlineNews/NaturalGas/6292750.xml> at 11 August 2010.

### Something to think about

*Research the circumstances and effects of the Exxon Valdez oil spill. In particular, what are the effects of the spill 20 years on?*

*After the Exxon Valdez oil spill the US government introduced the Oil Pollution Act 1990. There has been much commentary about the effectiveness of this Act in light of the BP oil spill. Research and comment on the positive and negative effects of this Act.*