# Professor Stuart Kaye Melbourne Law School University of Melbourne

"The protection of platforms, pipelines and submarine cables under Australian and New Zealand law"

The Protection of Platforms, Pipelines and Submarine Cables under Australian and New Zealand Law
Stuart Kaye
Professor, Melbourne Law School
DRAFT: Not for citation without author's permission
This paper was prepared as part of a broader study of Trans-Tasman maritime security undertaken by academics at several Australian and New Zealand law schools, and will appear as a chapter in a book on the subject next year.

### Introduction

Offshore facilities by and large did not exist before the middle of the 19<sup>th</sup> Century, when the first submarine cables were snaked across the world's oceans. Likewise, platforms exploiting undersea resources, most notably oil and gas, did not exist until the middle of the 20<sup>th</sup> Century, with World War II providing the spur for States to overcome the technological changes in exploiting the seabed, and piping oil and gas across the ocean floor.<sup>1</sup>

For Australia and New Zealand, these developments have been of tremendous impact. Since the 19<sup>th</sup> Century, submarine cables connected the two States to the rest of the world, allowing communication times to be reduced from weeks and months to days, hours and ultimately virtually instantaneously. Today the bulk of telecommunications traffic, including telephone and internet, travels via submarine cable and for Australia it is worth \$5 billion to the national economy.<sup>2</sup> Oil and gas platforms have allowed exploitation of substantial petroleum deposits to the extent that well over 80% of such production in Australia, and virtually all of it in New Zealand, is produced in offshore fields.<sup>3</sup>

As such, the loss or disruption for an extended period of oil and gas supplies from the offshore, or the severing of submarine communication links, would have a catastrophic effect on the economies of Australia and New Zealand. This underlies the importance of the protective regimes that exist internationally and domestically to protect these facilities from interference. This chapter considers the regime for the *in-situ* protection of offshore facilities from terrorist attack, including platforms, pipelines and submarine cables under international, Australian and New Zealand law. While relevant to an overall strategy to combat terrorism, broader regulatory mechanisms such as the International Ship and Port Facility Security Code will not be considered.

# International Law protecting Platforms, Pipelines and Cables

An early, albeit temporary, undersea oil pipeline was PLUTO, used by the Allies to provide the armies with gasoline in the months following the D-Day landings in France: see W.B. Taylor, 'PLUTO - Pipeline under the Ocean' *Archive: The Quarterly Journal for British Industrial and Transport History* 42, 2004, 48-64.

See Australian Communications and Media Authority, 'Submarine Telecommunications Cables', June 2008, available at http://www.acma.gov.au/WEB/STANDARD/pc=PC 100223#background

http://www.teara.govt.nz/EarthSeaAndSky/MineralResources/OilAndGas/6/en

See Geoscience Australia, 'Crude Oil and Gas Production by Basin, pre 1996 and 1996-2005', March 2008, available at http://www.ga.gov.au/image\_cache/GA11367.pdf; R. Gregg and C. Walrond, 'Oil and gas', *Te Ara - the Encyclopedia of New Zealand*, September 2007, available at

While platforms, pipelines and submarine cables all rest on the ocean floor, the international law applicable to their protection is different and distinct. Surprisingly, the international law with respect to platforms is very different to that with respect to pipelines and submarine cables, even though pipelines and platforms are often used in combination in the exploitation of natural gas or oil. In fact, the regime for pipelines is much more closely related to that used for submarine cables, even though they have very different uses. The differences between platforms, pipelines and submarine cables do make it necessary to consider each in turn.

The relevant international law pertaining to the protection of platforms constructed on the seabed is found in the United Nations Convention on the Law of the Sea.<sup>4</sup> The Convention provides that where a State has authority over the seabed, that is within its sovereignty over the territorial sea or internal waters or sovereign rights over its continental shelf, the coastal State has an exclusive right to control platforms on the seabed.<sup>5</sup> The State can assert its jurisdiction over activities taking place aboard such platforms<sup>6</sup>, and to authorise the construction of them.

The nature of the protection available to States pertaining to platforms in the coastal State's Exclusive Economic Zone (EEZ) is found in Article 60 of the Law of the Sea Convention, and which applies *mutatis mutandis* to the continental shelf by virtue of Article 80 of the Convention. Article 60 in part provides:

- 4. The coastal State may, where necessary, establish reasonable safety zones around such artificial islands, installations and structures in which it may take appropriate measures to ensure the safety both of navigation and of the artificial islands, installations and structures.
- 5. The breadth of the safety zones shall be determined by the coastal State, taking into account applicable international standards. Such zones shall be designed to ensure that they are reasonably related to the nature and function of the artificial islands, installations or structures, and shall not exceed a distance of 500 metres around them, measured from each point of their outer edge, except as authorized by generally accepted international standards or as recommended by the competent international organization. Due notice shall be given of the extent of safety zones.
- 6. All ships must respect these safety zones and shall comply with generally accepted international standards regarding navigation in the vicinity of artificial islands, installations, structures and safety zones.
- 7. Artificial islands, installations and structures and the safety zones around them may not be established where interference may be caused to the use of recognized sea lanes essential to international navigation.

United Nations Convention on the Law of the Sea, 2 December 1982, 1833 UNTS
 3.

<sup>&</sup>lt;sup>5</sup> Ibid., Articles 60 and 80.

<sup>6</sup> Ibid., Articles 56, 60 and 80.

8. Artificial islands, installations and structures do not possess the status of islands. They have no territorial sea of their own, and their presence does not affect the delimitation of the territorial sea, the exclusive economic zone or the continental shelf.

The above provisions indicate a coastal State is limited to a 500 metre safety zone around a platform, as no other distance has been agreed by the international community. While no purpose is explicitly indicated, the reference to navigation in Article 60(4) make it apparent that the perceived purpose at the time the Convention was adopted was navigational safety and avoiding accidents rather than a buffer zone to fend off attacks.<sup>7</sup>

On the seabed beyond national jurisdiction, all States have the right to construct platforms<sup>8</sup>, although exploitation of the seabed in these areas is pursuant to the approval of the International Seabed Authority.<sup>9</sup> The Law of the Sea Convention does not deal with the nature of safety zones around such features directly, although it is reasonable to assume a 500 metre safety zone may be declared them.<sup>10</sup> In practical terms, such waters are relatively remote in ocean, being a minimum of 200 nautical miles from the nearest land, and the seabed in such areas is typically oceanic crust, thousands of metres below the surface of the ocean. This means there are no platforms anywhere in the world beyond national jurisdiction at the present point in time.

More specific protection for platforms is provided for in the 1988 Protocol to the Convention for the Suppression of Unlawful Acts against the Safety of Maritime Navigation<sup>11</sup> (1988 SUA Protocol) and its 2005 Protocol to the Protocol (2005 SUA Protocol).<sup>12</sup> The 1988 SUA Protocol provides for cooperation and enforcement of a range of offences against fixed platforms, including seizure of a platform, acts of violence against a person on a platform, destruction or threatening the safety of a platform and the placement of a device to achieve such a result.<sup>13</sup> Jurisdiction to board a platform in the event of an offence taking place is, as might be expected, vested in the

Such a conclusion is consistent with the deliberations of the International Law Commission in the precursor provision to Article 60 within the Convention on the Continental Shelf: see Articles concerning the Law of the Sea, draft article 71: *Yearbook of the International Law Commission*, vol. 2, 1956, 264, UN Doc A/CN.4/97. See also M. Nordquist, *United Nations Convention on the Law of the Sea 1982: A Commentary*, Dordrecht: Martinus Nijhoff, 1993, Vol.2, p.577.

<sup>8</sup> Law of the Sea Convention, note 4, Article 87(d).

See Law of the Sea Convention, note 4, Part XI; and Agreement relating to the Implementation of Part XI of the United Nations Convention on the Law of the Sea, 28 July 1994, 1836 UNTS 3.

Law of the Sea Convention, note 4, Article 147.

Protocol for the Suppression of Unlawful Acts against the safety of Fixed Platforms located on the Continental Shelf, 10 March 1988, 1993 AustTS No.11.

Protocol of 2005 to the 1988 Protocol for the Suppression of Unlawful Acts against the safety of Fixed Platforms located on the Continental Shelf, 14 October 2005, 2005 ATNIF No.31.

<sup>13 1988</sup> SUA Protocol, note 11, Article 2.

coastal State, although States also retain a prescriptive jurisdiction over their nationals. <sup>14</sup> The 2005 SUA Protocol added to the range of offences to include the use of radioactive material or biological or chemical weapons against a platform or persons thereon, and releasing oil or gas calculated to cause serious injury or damage. <sup>15</sup> While there is greater scope for cooperation in dealing with such offences, the power to board a platform to respond to an attack is still vested in the coastal State implicitly under the Law of the Sea Convention. This can be contrasted to provisions permitting, albeit in limited circumstances, third party boardings under the 2005 SUA Protocol <sup>16</sup>, and seems to be based on the assumption that a coastal State would always have the capacity to take action with respect to platforms under its jurisdiction. Whether this is always the case is debatable. At the time of writing, the 1988 SUA Protocol was in force, but not its 2005 Protocol.

International law has considered issues surrounding the protection of submarine cables for well over 100 years. Since the adoption of the 1884 Convention for the Protection of Submarine Telegraph Cables<sup>17</sup>, for which special provision was made for the participation of the Australian colonies in their own right<sup>18</sup>, international law has emphasised the right of States to lay cables on the seabed outside territorial waters.<sup>19</sup> Regulatory efforts have focused on the attribution of responsibility for damage to cables, with that centering on the flag State of an offending vessel, rather than vesting jurisdiction in a coastal State or cable user.<sup>20</sup>

The current international law position has seen the United Nations Convention on the Law of the Sea effectively replace the 1884 Convention for the Protection of Submarine Telegraph Cables, and provides the principal duty of protection rests on the flag State of the vessel responsible for damage to the cable. Article 113 of the Law of the Sea Convention provides in part:

Every State shall adopt the laws and regulations necessary to provide that the breaking or injury by a ship flying its flag or by a person subject to its jurisdiction of a submarine cable beneath the high seas done wilfully or through culpable negligence, in such a manner as to be liable to interrupt or obstruct telegraphic or telephonic communications, and similarly the breaking or injury of a submarine pipeline or high-voltage power cable,

<sup>14</sup> Ibid., Article 3.

<sup>&</sup>lt;sup>15</sup> 2005 SUA Protocol 2005, note 12, Articles 2bis and 2ter.

Protocol of 2005 to the 1988 Convention for the Suppression of Unlawful Acts against the safety of Maritime Navigation, 14 October 2005, 2005 ATNIF No.30, Article 8bis.

Convention on the Protection of Submarine Telegraph Cables, 14 March 1884, 1901 AustTS No.1.

<sup>&</sup>lt;sup>18</sup> Ibid., Additional Article.

Law of the Sea Convention, note 4, Article 87(c).

Convention on the Protection of Submarine Telegraph Cables, note 17, Article X.

shall be a punishable offence. This provision shall apply also to conduct calculated or likely to result in such breaking or injury.

It should be noted from the above that the principle of flag State regulation of the breaking of a cable also applies to submarine pipelines. In practical terms this is of less importance for two reasons. First, where an undersea pipeline is used to assist in the exploitation of the seabed by a coastal State, the coastal State retains jurisdiction over the pipeline, and can make laws to protect the pipeline from accidental breakage or attack. Second, a likely consequence of the breakage of a pipeline would be to cause environmental harm, and this could provide a basis for the exercise of coastal State jurisdiction within its territorial sea or EEZ. 22

While the breaking of a pipeline may give a coastal State jurisdiction to take action in respect of an incident, *prima facie* here is no authorisation for the coastal State, nor for any other State using a cable, to have jurisdiction to punish any breaking of a cable beyond the territorial sea outside of the circumstances indicated in Article 113 of the Law of the Sea Convention. Australia's obligation under Article 113 is fulfilled by Section 7 of the *Submarine Cables and Pipelines Protection Act* 1969 (Cth), while under New Zealand law, *Submarine Cables and Pipelines Protection Act* 1996 (NZ) fulfils the same function.

That a coastal State does not have rights over a submarine cable beyond its territorial sea is confirmed elsewhere in the Law of the Sea Convention. Article 79 provides:

- 1. All States are entitled to lay submarine cables and pipelines on the continental shelf, in accordance with the provisions of this article.
- 2. Subject to its right to take reasonable measures for the exploration of the continental shelf, the exploitation of its natural resources and the prevention, reduction and control of pollution from pipelines, the coastal State may not impede the laying or maintenance of such cables or pipelines.
- 3. The delineation of the course for the laying of such pipelines on the continental shelf is subject to the consent of the coastal State.
- 4. Nothing in this Part affects the right of the coastal State to establish conditions for cables or pipelines entering its territory or territorial sea, or its jurisdiction over cables and pipelines constructed or used in connection with the exploration of its continental shelf or exploitation of its resources or the operations of artificial islands, installations and structures under its jurisdiction.
- 5. When laying submarine cables or pipelines, States shall have due regard to cables or pipelines already in position. In particular, possibilities of repairing existing cables or pipelines shall not be prejudiced.

\_

See *Law of the Sea Convention*, note 4, Article 79.

See Ibid., Article 56.

The text of the Article is clear, insofar as a coastal State cannot impede another State laying a cable through its EEZ, and possesses a jurisdiction over cables in its territorial sea, but no further.

The possibility of having a protective zone around submarine cables and pipelines, where activities were restricted, or anchoring prohibited, was explicitly considered by the International Law Commission (ILC) in 1956, in its preparation of the draft texts for the four Geneva Conventions on the Law of the Sea. The ILC rejected the notion as inconsistent with freedom of navigation, with even a limited proposal against anchoring near a cable failing to gain support. It was indicated that such a protective zone might prove an unacceptable impediment to freedom of navigation. Nothing in the present convention, or its predecessor conventions, provides for such a zone outside the territorial sea.

It is clear that a coastal State does have jurisdiction over the protection of a submarine cable within the territorial sea. This is explicitly confirmed in Article 21(1)(c) of the Law of the Sea Convention which provides that a coastal State's laws can be applied to a vessel exercising a right of innocent passage in respect of the protection of submarine cables and pipelines. Since a State can assert its jurisdiction over protecting cables, the proclamation of a protective zone in the territorial sea would be perfectly legitimate. This would permit a protection zone over the cables to a distance of 12 nautical miles.

Outside of the territorial sea, there is no explicit basis to assert jurisdiction over a submarine cable by a coastal State. However, States using the waters of the EEZ are subject to the laws of the coastal State providing that can be applied under the regime of the EEZ, as indicated by Article 58(3) of the Law of the Sea Convention:

3. In exercising their rights and performing their duties under this Convention in the exclusive economic zone, States shall have due regard to the rights and duties of the coastal State and shall comply with the laws and regulations adopted by the coastal State in accordance with the provisions of this Convention and other rules of international law in so far as they are not incompatible with this Part.

A protection zone for a submarine cable outside the territorial sea could be validly asserted by a State, providing the basis of jurisdiction was tied to a basis of jurisdiction that could be claimed under the regime for the EEZ or continental shelf. That is to say, protection over a cable could be achieved by restricting activities which could be validly regulated in the EEZ or continental shelf. For example, the protective measures directed towards the restriction of various types of fishing activity could be permissible in the EEZ as coastal States have jurisdiction in these waters based on Articles 56 and 62 of the Law of the Sea Convention. The jurisdiction to deal with environmental protection in the

\_

See Yearbook of the International Law Commission, vol. 2, 1956, 12, UN Doc A/CN.4/97.

EEZ would also provide a basis for jurisdiction for some types of activities, particularly those which might damage a pipeline, thus causing significant environmental harm.

# Protection of Platforms in Australian and New Zealand Law

The application of Australian law to protect platforms at sea operates within the territorial sea and beyond to all areas of seabed under Australian jurisdiction. As domestic law may operate on a platform under national jurisdiction, for Australia the principal legislation dealing with this circumstance is the *Crimes at Sea Act* 2000 (Cth). The *Crimes at Sea Act* 2000 (Cth) provides that the criminal law of the various states and territories can be applied in the oceans around Australia. It divides these oceans into separate areas of jurisdiction, and allocates criminal legislation to acts taking place in those waters. This is accomplished through the use of "adjacent areas", which were themselves first used in the offshore petroleum settlement in 1967. Each state, the Northern Territory and Ashmore and Cartier Islands Territory have a large area designated as adjacent to them. Outside the adjacent area, acts taking place on Australian ships, or by Australian nationals, or on a ship whose next port of call is Australia, the applicable criminal law is that of the Jervis Bay Territory by virtue of section 6 of the Act.

Within the adjacent areas, the substantive criminal law of the relevant state will apply, under clause 2 of the Cooperative Scheme implemented under section 5 of the Act. The cooperative scheme indicates that within the territorial sea, state criminal law applies of its own force, and that outside the territorial sea, state criminal law applies by virtue of the force of Commonwealth law. These provisions are to avoid the necessity of the state demonstrating a nexus between the criminal act and the state, which would otherwise be required to justify the extraterritorial operation of state law. As such, terrorist acts on board ships in the adjacent area against an Australian platform would fall within the criminal law of the respective Australian state adjacent to the incident's location.

In terms of the interaction of the *Crimes at Sea Act* 2000 (Cth) with other criminal legislation, it is worth stressing that the *Crimes at Sea Act* 2000 (Cth) was not intended to be the sole source of applicable criminal law at sea for Australia. The Act certainly does not explicitly displace other legislation. The purpose of the Act is to apply state criminal law offshore in certain circumstances. It does not prevent other more specific legislation applying to platforms at sea.

Protection of platforms internationally through the 1988 SUA Protocol provided an impetus to strengthening the regime for the protection of platforms in domestic law. The *Crimes (Ships and Fixed Platforms) Act 1992* (Cth) was enacted to implement the SUA

See R. Cullen, Federalism in Action: The Australian and Canadian Offshore Disputes, Sydney: Federation Press, 1990, pp.65-70.

Crimes at Sea Act 2000 (Cth) preamble.

The High Court in *Union Steamship v King* (1988) 166 CLR 1 indicated that the pre-Australia Act requirement of a nexus was still required to found the operation of state law extraterritorially.

Convention with respect to crimes against ships and the 1988 SUA Protocol with respect to crimes against fixed platforms. The portion of the Act that specifically applies to fixed platforms is Part III. It creates a series of offences against fixed platforms including seizing control of a fixed platform<sup>27</sup>, acts of violence against a person on board a fixed platform knowing the act may endanger the platform's safety<sup>28</sup>, destroying or damaging a platform in such a way as to endanger its safety<sup>29</sup>, and placing a destructive device on a platform so as it endanger its safety.<sup>30</sup> Additional offences are created for causing death<sup>31</sup>, grievous bodily harm<sup>32</sup> or injury<sup>33</sup> in the course of committing the offences against a platform, as well as threatening to endanger a platform. <sup>34</sup> Most of these offences have substantial penalties attaching to them.

The offences are designed to operate outside the territorial sea, but are not limited to offences taking place in Australian waters or upon Australian installations. Providing there is an Australian element<sup>35</sup>, or the offence takes place on the installation of another State party to the 1988 SUA Protocol, if the victim or offender were a national of such a State, or otherwise affected such a State, the location of the incident is not significant.<sup>36</sup>

Some protections for platforms are also provided for in the Sea Installations Act 1987 (Cth), although these are separate from the measures discussed above. The Sea

<sup>27</sup> Crimes (Ships and Fixed Platforms) Act 1992 (Cth) s 21.

<sup>&</sup>lt;sup>28</sup> Ibid., s 22.

<sup>&</sup>lt;sup>29</sup> Ibid., s 23.

<sup>&</sup>lt;sup>30</sup> Ibid., s 24.

<sup>&</sup>lt;sup>31</sup> Ibid., s 25.

<sup>&</sup>lt;sup>32</sup> Ibid., s 26.

<sup>&</sup>lt;sup>33</sup> Ibid., s 27.

<sup>&</sup>lt;sup>34</sup> Ibid., s 28.

This requirement is satisfied where the platform is on the Australian continental shelf, or the alleged offender is an Australian national: Ibid., s 29(3).

Crimes (Ships and Fixed Platforms) Act 1992 (Cth) s 29(4) provides:

For the purposes of this section, an offence against this Part had a Protocol State element if one of the following circumstances applied:

<sup>(</sup>a) the fixed platform concerned was on the continental shelf of a Protocol State;

<sup>(</sup>b) the fixed platform concerned was in the territorial sea or internal waters of a Protocol State;

<sup>(</sup>c) the alleged offender was a national of a Protocol State;

<sup>(</sup>d) the alleged offender was stateless and was habitually resident in a Protocol State that had extended its jurisdiction under Article 3(2)(a) of the Protocol;

<sup>(</sup>e) during the commission of the alleged offence, a national of a Protocol State was seized, threatened, injured or killed and the Protocol State had extended its jurisdiction under Article 3(2)(b) of the Protocol;

<sup>(</sup>f) the alleged offence was committed in an attempt to compel a Protocol State to do or abstain from doing any act and the Protocol State had extended its jurisdiction under Article 3(2)(c) of the Protocol.

Installations Act deals with a very limited category platforms, which form a very small fraction of those platforms that might be found off the Australian coast. The definition of a sea installation under the Act does not include resource installations, mobile offshore drilling units, installations used with submarine cable and pipelines, defence or navigational facilities.<sup>37</sup>

At present there is limited authority directed at the enforcement in Australian law of the 500 metre safety zone, the bulk of which is contained in the *Offshore Petroleum Act* 2006 (Cth), which itself has recently replaced the *Petroleum (Submerged Lands) Act* 1967 (Cth). Section 329 of the *Offshore Petroleum Act* 2006 (Cth) provides that 500 metre safety zones can be proclaimed around structures, wells or equipment by the Designated Authority and published in the *Gazette*. All vessels, or all vessels of a particular type can be excluded from the safety zone, and it is an offence of strict liability for a vessel to enter or remain in the safety zone. The penalty can be applied to the owner and/or the master of the vessel. The offence is one of strict liability, and since the adoption of the newer legislation, the penalties are substantial.<sup>38</sup>

Division 3 of Part 4.5 the *Offshore Petroleum Act* 2006 (Cth) reflecting the equivalent provisions in Division 3A of the *Petroleum (Submerged Lands) Act* 1967 (Cth) provides for more specific powers in respect of safety zones and areas to be avoided. At present, the only area to be avoided is designated in Schedule 2 of the *Offshore Petroleum Act* 2006 (Cth), or formerly Schedule 6 of the *Petroleum (Submerged Lands) Act* 1967 (Cth), and is a defined area surrounding the Bass Strait oilfields. Section 327 of the *Offshore Petroleum Act* 2006 (Cth) provides that where the Minister is satisfied that a terrorist attack is likely to occur that would cause damage or injury to any equipment or person in the area to be avoided or safety zone, then a state of emergency can be proclaimed by a *Gazette* notice. Such a state of emergency can continue for up to 14 days from the issue of the notice. The Minister can extend the period for a further 14 days, after consultation with the Designated Authority. Terrorism is broadly defined, explicitly to include activities involving extortion. The method of the petroleum and the period for a further 14 days, after consultation with the Designated Authority.

\_

Sea Installations Act 1987 (Cth) s 4.

Offshore Petroleum Act 2006 (Cth) s 329.

<sup>&</sup>lt;sup>39</sup> Ibid., s 327.

<sup>&</sup>lt;sup>40</sup> Ibid., s 326.

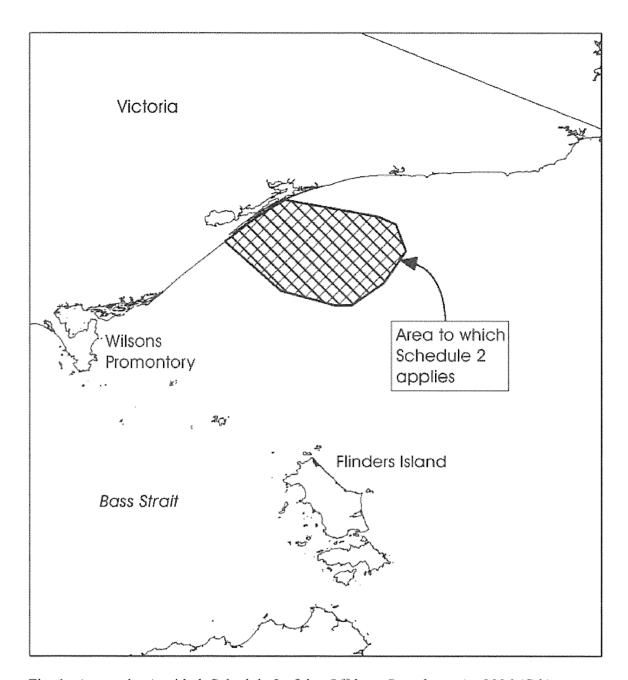


Fig. 1 Area to be Avoided, Schedule 2 of the Offshore Petroleum Act 2006 (Cth)

The area to be avoided is closed to vessels in excess of 200 tonnes or a tonnage length of at least 24 metres, and are Australian flagged vessels (or capable of being registered as such), and vessels engaged in petroleum activities.<sup>41</sup> Except this last category, foreign flagged vessels are exempt.<sup>42</sup> This is because at international law, freedom of navigation would not permit Australia to close off an area of its EEZ to shipping, but it can restrict its own vessels, or vessels seeking to exploit its EEZ. Consultation with the IMO to set up a traffic separation scheme for the area in the vicinity of the Bass Strait oil fields was

<sup>&</sup>lt;sup>41</sup> Ibid., s 331.

<sup>&</sup>lt;sup>42</sup> Ibid., s 326.

the manner in which this limitation was minimised.<sup>43</sup> Unauthorised entry by applicable vessels into the area to be avoided attracts a maximum \$50000 fine and/or 5 years imprisonment for the owner and master. The offence is one of strict liability.<sup>44</sup>

If an unauthorised vessel enters the safety zone or area to be avoided, then a range of powers are available to authorized persons. These powers include boarding the vessel to answer questions relating to the vessel and its movements, search the vessel documents relating to it or its movements, require registration documents of Australian flagged vessels, require the master of an unauthorized vessel to remove it from the zone, require the master to permit measurements of the vessel, tow a disabled vessel from the zone, and detain a vessel that has contravened the entry restrictions. Refusal to cooperate with or obstructing an authorized person is an offence which is punishable by a fine of up to 50 penalty units. 45

The exercise of the power of boarding, questioning, search, measure and detention can only be done under warrant issued by a Magistrate, which is defined to include a Justice of the Peace. The warrant can be dispensed with if the authorized person has reasonable grounds to believe the vessel is, was or will soon be in contravention and the exercise of powers is necessary to prevent damage to structures, pipelines or equipment, and the circumstances are of a serious nature.<sup>46</sup>

Section 184A of the Customs Act 1901 (Cth) gives a right to board a vessel that is within 500 metres of an offshore resource installation to establish the identity of the vessel, or if there is a reasonable suspicion that the vessel is, was or is in preparation of a breach of the Customs Act or prescribed legislation. This is part of the general boarding power in the Customs Act, and contains robust provisions with respect to mothership apprehension. However, the *Petroleum (Submerged Lands) Act* 1967 was not, and the *Offshore Petroleum Act* 2006 (Cth) is not a prescribed Act in the *Customs Regulations* 1926 (Cth). Surprisingly, the *Crimes (Ships and Fixed Platforms) Act* 1992 (Cth) is prescribed under Regulation 31AAA of the *Customs Regulation* 1926 (Cth). This means the latter Act is enforceable by officers authorized under the Customs Act, but the former Act is not.

There is also implementation of the International Shipping and Port Facility Security Code for Australia in the *Maritime Transport and Offshore Facilities Security Act* 2003 (Cth). This Act provides for a regulatory regime to ensure that persons working in maritime industries, including aboard offshore oil and gas platforms, are appropriately

The current coordinates of the scheme are available online at http://www.navcen.uscg.gov/marcomms/imo/COLREGS\_circulars/COLREG2-Circ50.pdf

Offshore Petroleum Act 2006 (Cth) s 331.

Ibid., s 332 and 333. At the time of writing, a penalty unit was \$110, meaning the maximum fine was \$66000: *Crimes Act* 1914 (Cth) s 4AA.

<sup>46</sup> Offshore Petroleum Act 2006 (Cth) s 334.

<sup>47</sup> Customs Act 1901 (Cth) s 184A.

screened and subject to security controls. As the function of the Act is regulatory rather than punitive, its focus is on establishing Offshore Facility Security plans rather than creating a series of offences designed to be enforced by police or the Australian Defence Force. This is reflected in administrative responsibility for the Act resting with the Office of Transport Security within the Department of Infrastructure, Transport, Regional Development and Local Government. While this chapter principally considers the potential responses to maritime terrorism at sea, this should not be taken as diminishing the significance of the regulatory environment through the *Maritime Transport and Offshore Facilities Security Act* 2003 (Cth) in helping to increase security offshore.

It should also be noted that Australia has responsibility with Timor-Leste for the management of petroleum activities in the Joint Petroleum Development Area (JPDA) in the Timor Sea. Article 19 of the Timor Sea Treaty<sup>48</sup> provides Australia and Timor-Leste will "exchange information on likely threats to, or security incidents relating to, exploration for and exploitation of petroleum resources in the JPDA" and "make arrangements for responding to security incidents in the JPDA". In furtherance of this provision, the two States concluded a security Memorandum of Understanding in 2006.<sup>49</sup>

As with Australia, New Zealand has a number of measures designed to facilitate legislative protection for offshore platforms. First, the criminal law of New Zealand is deemed to operate aboard all oil, gas or other platforms operating upon New Zealand's continental shelf. This is provided for under section 7 of the *Continental Shelf Act* 1964 (NZ) which imports civil and criminal jurisdiction to these offshore facilities. In application it treats the installations as if they were part of New Zealand landward of the ordinary spring high tide. The lack of additional subsidiary jurisdictions like the Australian states mean the provision is far less complicated that the *Crimes at Sea Act* 2000 (Cth) in Australia.

There is also provision for the declaration of a 500 metre safety zone around a New Zealand offshore installation. Section 8 of the *Continental Shelf Act* 1964 (NZ) provides that the Governor-General may make regulations in respect of safety zones around such facilities, and to exclude shipping from these zones. The Governor-General has promulgated a number of regulations in respect of safety zones around facilities off the New Zealand coast.<sup>51</sup>

<sup>&</sup>lt;sup>48</sup> *Timor Sea Treaty*, 20 May 2002, 2003 AustTS No.13.

A. Downer, 'Australia and East Timor Sign Security Arrangement on Joint Petroleum Area' Media Release, October 2006, available at http://www.foreignminister.gov.au/releases/2006/fa112 06.html

Continental Shelf Act 1964 (NZ) s 7.

Continental Shelf (Pohokura Platform B Safety Zone) Regulations 2006 (NZ); Continental Shelf (Umuroa Installation Safety Zone) Regulations 2008 (NZ); Continental Shelf (Maui A Safety Zone) Regulations 1975 (NZ); Continental Shelf (Maui B Safety Zone) Regulations 1991 (NZ); Continental Shelf (Floating Production, Storage, and Off-Loading Installation Safety Zone) Regulations 1996

New Zealand also has legislation to implement the 1988 SUA Protocol with respect to fixed platforms. The *Maritime Crimes Act* 1999 (NZ) closely reflects the SUA Protocol's provisions for offshore installations, although there is no specific reference to the SUA Convention or its 1988 Protocol within the text. At the time of writing, the legislation did not reflect the content of the 2005 SUA Protocol.

# Protection of Submarine Cables and Pipelines in Australia and New Zealand

The protection of pipelines in Australia is principally dealt with under the *Submarine Cables and Pipelines Act* 1963 (Cth). The Act establishes a basic protection scheme derived from the obligations under the Submarine Cables Convention, and adopted in the *Submarine Telegraph Act* 1885 (Imp). It applies to cables and pipelines beneath the high seas or within the exclusive economic zone.<sup>52</sup> The Act makes it an offence for an individual to break or injure a submarine cable or pipeline, whether negligently or deliberately, although the penalties vary depending upon the motivation of the offender.<sup>53</sup>

The application of these offences is only to persons operating on board Australian registered vessels, and not individuals operating off vessels registered in other States, regardless of the location of the pipeline. This closely reflects the requirements for States under Article 113 of the Law of the Sea Convention which treats the protection of pipelines and cables as a flag State rather than a coastal State matter.

A regulatory regime for pipelines does exist under the *Offshore Petroleum Act* 2006 (Cth), but this is not intended to deal with protection of pipelines from interference, but rather to address occupational health and safety measures. Similarly, the *Maritime Transport and Offshore Facilities Security Act* 2003 (Cth) deals with regulatory matters pertaining to the security of ships, platforms and shore facilities under the ISPS Code,

(NZ); Continental Shelf (Kupe Wellhead Platform Safety Zone) Regulations 2006 (NZ).

- 52 Submarine Cables and Pipelines Act 1963 (Cth) s 5 provides:
  - (1) This Act applies only to a submarine cable or pipeline, or that part of a submarine cable or pipeline:
  - (a) that is beneath the high seas or in the exclusive economic zone; and
  - (b) that is not a submarine cable (within the meaning of Schedule 3A to the *Telecommunications Act* 1997) in a protection zone (within the meaning of that Schedule).
- Negligent conduct attracts a maximum penalty of \$2000 or imprisonment for 12 months, whereas negligent conduct attracts a maximum penalty of \$1000 or imprisonment for 3 months: *Submarine Cables and Pipelines Protection Act* 1963 (Cth) s 7.

and since the Code does not purport to deal with undersea pipelines, neither does the Act. 54

More generally, an attack on a pipeline might fall under more general offences, related to terrorist offences or causing environmental harm.<sup>55</sup> Such offences may apply to a pipeline by virtue of the operation of the *Crimes at Sea Act* 2000 (Cth) or in respect of offences relating to the environmental harm that might be caused by damaging a pipeline, however there are no other specific provisions.

The protection of submarine cables in Australia is covered in two pieces of legislation. The *Submarine Cables and Pipelines Protection Act* 1963 (Cth) discussed above applies to submarine cables in the same fashion as its operation for pipelines. It is important to note that since 2005 the operation of the *Submarine Cables and Pipelines Protection Act* 1963 (Cth) in respect of submarine cables was substantially altered with the removal of cables used for telecommunications under a different regulatory scheme.

The second regime for the protection of submarine cables is within Schedule 3A of the *Telecommunications Act* 1997 (Cth) and was introduced in 2005. It provides for an extensive scheme of protected areas to be established around submarine cables by the Australian Communications Management Authority (ACMA). A protected area may prohibit a range of activities including certain types of fishing, anchoring, laying other cables or seabed mining. Other activities may be substantially restricted. Before implementation, a protection zone around the cable must be the subject of public consultation with potentially affected groups. The Act provides a great deal of detail in relation to the incorporation of the consultation process into the administrative decision-making that creates the protected area.

Schedule 3A of the *Telecommunications Act* 1997 (Cth) also provides for a number of offences in the event a cable is damaged or disrupted in some fashion. The deliberate damaging of a cable within a protected zone attracts a maximum penalty of 600 penalty units and up to 10 years imprisonment. Negligently damaging a cable attracts a fine of up to 180 penalty units and up to 3 years imprisonment and is an offence of strict liability. There are also offences directed at the master and owner of a ship which was used in the damaging of a cable, again attracting significant penalties, including imprisonment. Even if the cable itself is undamaged, similar offences are directed at individuals, the master and the owner of an offending ship, simply by breaching the

Ibid., Schedule 3A, cl 36.

For the purposes of the Act, pipelines are not part of an offshore facility: *Maritime Transport and Offshore Facilities Security Act* 2003 (Cth) s 17A(5).

Environmental Protection and Biodiversity Conservation Act 1999 (Cth) s 24AA.

Telecommunications Act 1997 (Cth) Schedule 3A, cl 10.

Ibid., Schedule 3A, cl 11.

<sup>&</sup>lt;sup>59</sup> Ibid., Schedule 3A, cl 37.

Ibid., Schedule 3A, cl 39.

restrictions imposed within a protected zone, again with substantial penalties.<sup>61</sup> Provision is also made for civil claims in respect of damage.<sup>62</sup>

Since Schedule 3A of the *Telecommunications Act* 1997 (Cth) entered into force, ACMA has sponsored the creation of three protected areas, through two consultation processes. The principal communications cables on the east coast, the Southern Cross and the Australia Japan cables are both within extensive protected zones up to 15.7 kilometres wide and extending up to 75 kilometres out to sea. Shortly after the creation of the eastern protected zones, a zone was implemented around the principal western cable, the SEA-ME-WE3 cable, extending some 94.5 kilometers out to sea. The consistency with international law of measures beyond the territorial sea discussed above is questionable. 64

The protection of pipelines and cables in New Zealand is dealt with under the *Submarine Cables and Pipelines Protection Act* 1996 (NZ). Section 7 of the Act reflects New Zealand's obligations under the Law of the Sea Convention with respect to establishing a regime for liability for damage to cables and pipelines under Article 113. The Act also provides for an extensive regime of protection of cables and pipelines<sup>65</sup>, including the creation of protected zones around cables and pipelines where fishing or anchoring is prohibited.<sup>66</sup>

The application of the Submarine Cables and Pipelines Protection Act 1996 (NZ) does not run into the same international law jurisdiction concerns that the provisions applicable to submarine cables in Australia face under the Telecommunications Act 1997 (Cth). The New Zealand legislation explicitly limits its jurisdictional application to New Zealand's territorial sea and internal waters, or actions undertaken from New Zealand ships, or by New Zealand nationals aboard foreign registered vessels. This is entirely consistent with the accepted types of jurisdiction under international law. Further, to ensure that the application of New Zealand law does not create difficulties with other States, where the Act might apply to activities taking place beyond the territorial sea, there is a requirement that the Attorney-General issues a certificate in order that a prosecution may go ahead. The same protection of the same protection of the prote

Ibid., Schedule 3A, cl 40 and cl 44.

Ibid., Schedule 3A, cl 45.

Submarine Cable (Northern Sydney Protection Zone) Declaration 2007 (Cth); Submarine Cable (Southern Sydney Protection Zone) Declaration 2007 (Cth); Submarine Cable (Perth Protection Zone) Declaration 2007 (Cth).

S.B. Kaye, 'International Measures to Protect Oil Platforms, Pipelines and Submarine Cables from Attack' *Tulane Maritime Law Journal* 31, 2007, 377, 418-421.

The Act also provides for the seizure of equipment and documents, as well as orders for a ship's identification or removal from the protected area: see *Submarine Cables and Pipelines Protection Act* 1996 (NZ) s 20 and 21.

<sup>66</sup> Ibid., s 12 and 13.

<sup>67</sup> Ibid., s 4.

<sup>&</sup>lt;sup>68</sup> Ibid., s 27.

The Submarine Cables and Pipelines Protection Act 1996 (NZ) and its associated regulations have been extensively used since their enactment, and a large number of protection zones around cables and pipelines have been designated. These include protection areas in the Hauraki Gulf, Cook Strait, Great Barrier Island, Kawau Island, Whangaparoa Peninsula, Muriwai Beach and Taharoa Beach as well as a submarine pipeline restriction area applying to all New Zealand ships associated with the Maui Pipelines. Further, there has been integration of these protection areas as part of an overall scheme of protection pertaining to other matters offshore. This allows mariners to be aware of protection arrangements in relation to fisheries and resource management, the discharge of harmful substances as well as the protection of cables and pipelines. A single publication provides information on all of these areas, together with detailed maps to visually indicate the extent of all protected areas.<sup>69</sup>

## **Conclusions**

Both Australia and New Zealand have made some progress in recent years to provide for greater legislative protection for offshore installations, pipelines and cables. This is not surprising, as both States are keenly aware of their reliance on these offshore facilities, and both are conscious of the raft of international measures designed to facilitate maritime security.

In some respects, Australian protection of oil and gas installations appears more advanced, but this probably reflects the larger numbers of Australian oil and gas platforms, and the much greater threat faced by these facilities rather than any fault on New Zealand's part. Both States have indicated support for further protective measures and are working towards eventual implementation of the 2005 SUA Protocol. Both States too have worked in recent times to provide for greater protection of undersea structures like pipelines and cables, and in this respect New Zealand seems further advanced, particularly in the provision of integrated information for seafarers in respect of the range of offshore protected areas and the scope of activities permitted in and around such zones. Australian progress in respect of the protection of pipelines and other forms of submarine cable not used for data traffic, like for example the Basslink power cable linking Tasmania to the national electricity grid has been much slower.

One issue raised by the protection available to submarine cables under Schedule 3A of the *Telecommunications Act* 1997 (Cth) has been whether the measures are consistent with international law. The Law of the Sea Convention guarantees freedom of navigation in the EEZ and beyond, and places responsibility for harm to submarine cables with flag States. The Australian scheme potentially restricts some aspects of freedom of navigation well beyond the 12 nautical miles of the territorial sea, and does so without

http://www.doc.govt.nz/templates/MultiPageDocumentTOC.aspx?id=43055

Victoria A. Froude, *Area-Based Restrictions in the New Zealand Marine Environment*, Wellington: New Zealand Department of Conservation, 2004, available online at

reference to the flag State of an offending vessel. This raises questions as to whether the Australian measures are consistent with international law.

It is clear that ACMA has acted under the Schedule 3A of the *Telecommunications Act* 1997 (Cth), and that from a domestic legal position, the lack of compliance with international law, does not affect the validity of the Act. The High Court of Australia in *Horta v Commonwealth*<sup>70</sup> held that an Australian court would not invalidate legislation validly framed under a head of power in the Constitution even if it was clear the legislation might be contrary to international law. However, given the measures could be made compliant with international law with some modification, which would not unduly undermine their effectiveness, they may draw international protest. Limiting restrictions in the EEZ to fishing related activities, drilling and exploitation of the seabed and environmental matters such as scuttling or the use of a spoiling ground, would ensure that Australia complies with its international obligations. In addition, it may be appropriate for States so reliant upon submarine cable traffic, such as Australia and New Zealand, to promote States revisiting the relevant international law, and to call for its updating.