

REGULATORY REFORM IN THE AUSTRALIAN DOMESTIC INDUSTRY

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SUMMARY

Following a review of marine safety within Australia, the Australian Transport Ministers have agreed on a strategy to promote a uniform national approach to marine safety in Australia.

Previous attempts to achieve uniformity and mutual recognition between the Australian States and Territories have met with limited success. The paper looks at the background to the current situation pertaining to domestic commercial vessels. Relevant factors are identified that must be addressed to achieve government goals in this area.

The paper then considers in more detail specific issues, objectives and reforms that are underway or planned in the future in the legislation, standards and administration applicable to domestic commercial vessels.

INTRODUCTION

Most people would say that Australia has a satisfactory record for maritime safety by world standards. However, there can be no room for complacency. Studies have shown that, in past years, the fishing industry has had one of the highest rates of fatal injury of any working group in Australiaⁱ. Also, though fortunately very infrequent, any incident involving large numbers of fatalities can have social, political and economic consequences that go far beyond the consequences of the event to those directly involved. Australia must maintain an effective system of safety regulation that can meet community expectations for safety.

Australia's system for the safety regulation of domestic commercial vessels presents special challenges not faced by other nations. Regulation is by a number of independent sovereign Governments. The strong commitment that each sovereign State, Territory or Federal body has to ensuring safety measured by its own legislation, standards, policies and processes can give rise to conflicts if there are differing philosophies, objectives and perceptions of appropriate risk control measures. These conflicts and the resultant lack of confidence that they bring create barriers to the movement of vessels and personnel giving rise to costs, frustrations and delays.

ONE NATION—EIGHT SYSTEMS

As already mentioned, the safety of commercial vessels in Australia is not the responsibility of a single Australian government. It is regulated by one of eight governments, depending upon whether the vessel operates internationally, interstate or intrastate and whether it is engaged in trading or fishing operations, see Table 1.

The reason for this split in jurisdiction goes back to Australia's colonial past when Australia was occupied by a number of separate British colonies. These colonies formed a federation of States and with it a Federal Government with specific powers granted to it by the Constitutionⁱⁱ. The Australian Constitution makes the Federal Government responsible for international shipping and for interstate trading vessels. Residual powers for all

shipping not specifically dealt with by the Constitution was retained by the individual State Governments.

The multi-jurisdictional arrangements that were instituted by the Australian Constitution in 1901 are still in place today, making Australia unique amongst nations in its arrangements for the safety regulation of shipping. The closest parallel is the European Union where separate sovereign nations have come together to gain the benefits of co-operative effort and standardization. But even here, the member nations have agreed to the establishment of a single European Maritime Safety Agency to oversee implementation of European Community Legislationⁱⁱⁱ.

Table 1—Responsibility for Marine Safety

	Type of operation		
	International	Interstate	Intrastate
Trading vessels	Federal government	Federal government	State/Territory governments
Fishing vessels	Federal government	State/Territory governments	State/Territory governments

The multi-jurisdictional nature of marine safety regulation within Australia has brought with it challenges normally reserved for the international arena. At the international level, the boundaries between sovereign nations give rise to issues of mutual recognition and uniformity. Likewise, at the domestic level, the boundaries between sovereign Australian States and Territories have given rise to similar issues of mutual recognition and national uniformity.

CHANGES IN SAFETY CONCEPTS AND REGIMES SINCE 1901

The 20th Century has seen major changes in safety standards applicable to vessels. Standards at the beginning of the last century were relatively simple and based on the UK Board of Trade requirements that were mainly applicable to larger vessels or passenger vessels. Since then, a number of significant events have impacted on standards applicable to vessels in internationally and in Australia, see Table 2.

The 20th century also saw the introduction and then widespread use of liquid fuel and internal combustion engines, the introduction aluminium and fibre-reinforced plastics and the development of high speed craft as well as many other specialized vessel types.

Table 2—Some 20th century events that have shaped marine safety regulation

1912 the loss of the Titanic
1914 the first Safety of Life at Sea (SOLAS) regulations
1929 revised SOLAS regulations
1934 the loss of the Coramba (mandatory carriage of radios)
1938 the capsizing of the ferry Rodney
1960 revised SOLAS regulations
1966 Load-line convention
1972 the capsizing of the cargo ship Blythe Star
1987 the capsizing of the Herald of Free Enterprise
1993 the loss of the Estonia
1993 Adoption of ISM Code by SOLAS

Over the same period of time, public expectations of safety have also changed. The number of lives and vessels that were lost on the Australian coast at the turn of the 20th Century would be totally unacceptable today. Recent years have seen the development of holistic approaches to safety as characterised by Robens style Occupational Health and Safety legislation^{iv}.

All these factors have meant that the safety outcomes that were in place in 1901 when Australia became a federation are very different from those applicable today. Yet in many ways, the safety regimes that achieve these outcomes have not changed greatly.

As the scope and complexity of marine legislation and standards grew, issues of mutual recognition became more apparent. Each of the Australian jurisdictions developed legislation and standards applicable to domestic vessels in relative isolation of that of the other jurisdictions.

THE UNIFORM SHIPPING LAWS CODE

By the late 1950's, it was apparent that the plethora of differing standards applicable to domestic commercial vessels in Australia was a barrier to the mutual recognition of vessels. A first attempt to address the problem in the late 1960's was the development of the 'Model Code'. Standards were developed for structure and stability but they were not widely implemented, with apparently only one state actually applying the Model Code.

In 1971, arrangements were put in place to develop the Uniform Shipping Laws Code^v. Assisted by a Secretariat, the Australian marine authorities contributed resources to develop a set of uniform marine safety standards over a 9 year period.

The USL Code was based on standards obtained from a wide range of sources including SOLAS, the US Federal Code of Regulations, classification society rules, the Model Code, standards previously used by individual states, and standards developed from original work contained in technical papers. These standards were adapted to the particular Australian context to reflect past experience and an assessment of the capacity of the domestic

industry at that time to accommodate what was in effect a raising of standards in some jurisdictions.

When first published in 1979, the USL Code was a significant achievement. Not only did it represent a consensus between the many views of the various jurisdictions, but also it provided for what were then a number of important new technologies that were coming into the domestic commercial vessel industry. Standards were specified for aluminium, fibreglass and ferro-cement construction. Standards were provided that were applicable to small to moderate sized, high capacity passenger carrying charter vessels with or without sails. It has been said that the recognition of these new technologies within the USL Code may have played at least some small part in the subsequent establishment of Australia as an innovator in the design of commercial vessels including the development of catamarans and high speed craft.

However, the publishing of the USL Code did not mean its immediate adoption. Some States were quick to adopt the USL Code in their legislation. For others, it would be over a decade before the USL Code would be explicitly picked up by legislation. Notwithstanding these delays, the USL Code was hailed as a significant improvement in the mutual recognition of vessels.

THE THOMPSON CLARKE REPORT

In 1995, the Australian Transport Council commissioned the Thompson Clarke report^{vi} to review marine safety in Australia. The review noted in its terms of reference that current maritime safety regulatory and operational arrangements (including those for commercial vessel safety) lacked an overall national approach.

Given that the USL Code was intended to provide a uniform standard, why was such a review necessary? It would appear that the introduction of the USL Code 17 years before had not been sufficient in itself to overcome the problems of uniformity and mutual recognition.

The Thompson Clarke report identified a number of reasons for this, including

- (a) Different perceptions among regulators of their specific role. No uniform statement of the rationale for government involvement in Commercial Vessel safety.
- (b) Differences in the manner and extent to which the USL Code had been picked up by the enabling legislation of the various States and the Northern Territory.
- (c) Modifications of standards by jurisdictions to provide for perceived regional requirements to meet particular operational needs including geographical and climatic variations. Most jurisdictions selectively ignore some Code requirements and that in some cases they impose requirements outside the Code.
- (d) Differences in interpretation and application of the USL Code, not only between jurisdictions but in some cases within a jurisdiction.
- (e) No mutually accepted practice for assessing and approving proposed new technology or operations, in a manner which would lead directly to full acceptance and recognition of the outcomes in a timely manner.
- (f) The USL Code has become out of date, at least for certain types of vessels or in specific aspects of vessel design. The review processes of the USL Code had failed to keep a-pace with modern technology and had not addressed perceived problems

of application of the Code. The review processes were cumbersome, tended to be based on big ship practice and failed to take into account industry views

- (g) Insufficient use of risk management techniques and a lack of agreement for mutual recognition of the outcomes when such techniques are applied;
- (h) Insufficient resources in the regulatory administrations. There is an evident connection between the general resource levels and observed difficulties in addressing problems within the USL Code.
- (i) No common approach to training and practice in the survey field.
- (j) Partial lack of a sense of common purpose among the staff of the various marine authorities.

It should be noted that some of the reasons pertain directly to the USL Code itself, but many were beyond the scope of the Code. The report stated

“Many in industry with fairly conventional operating requirements saw the USL Code itself as working reasonably well, despite gaps in coverage and implementation, and delays in updating requirements. These interests saw the Code filling a niche not adequately covered by Commonwealth Navigation Act standards, ship classification society rules or any specific Australian or international standards.”

Thus the USL Code went part of the way toward achieving its objectives, but could not deliver all that was needed.

THE MARINE SAFETY STRATEGY

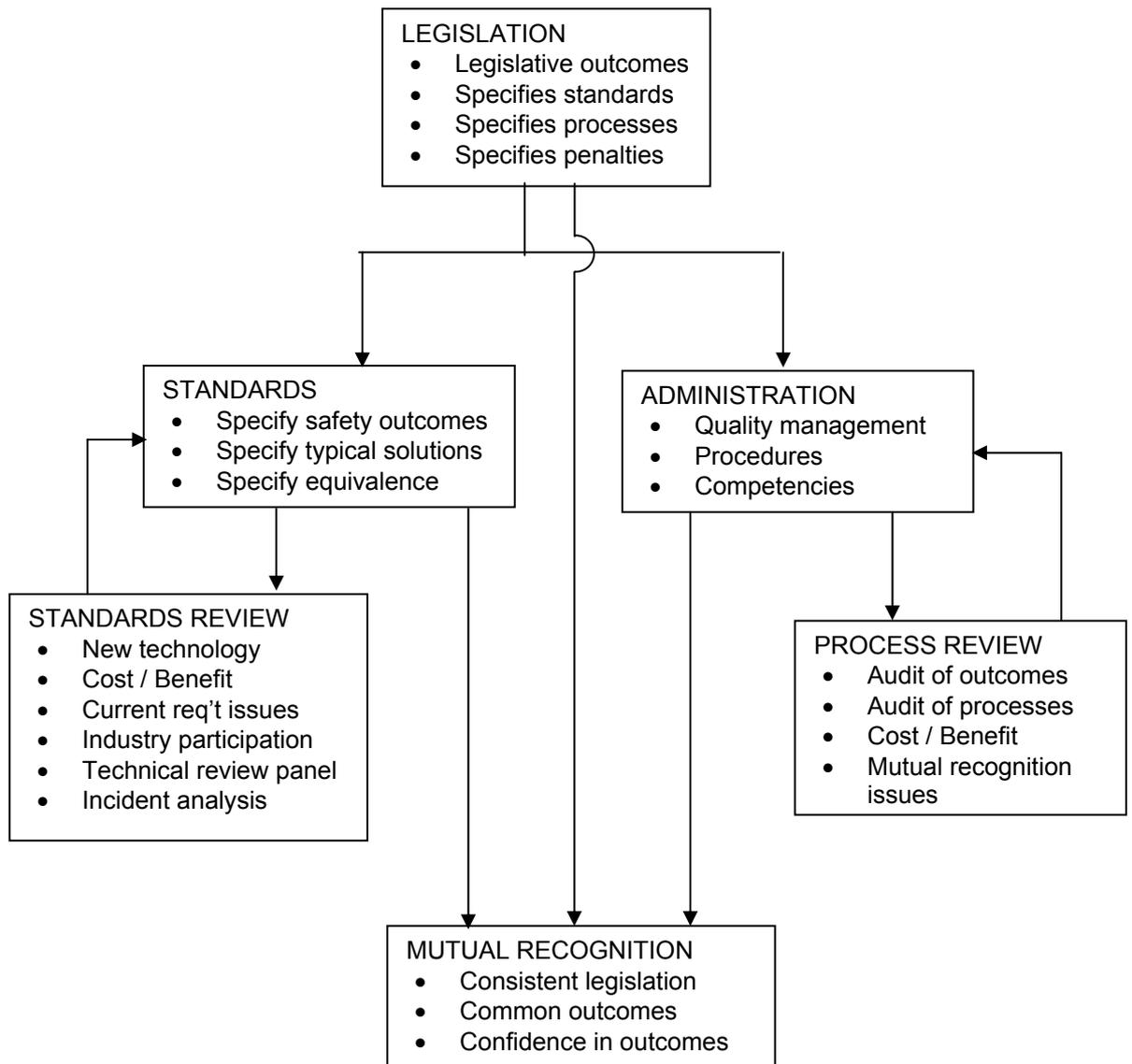
In response to the Thompson Clarke review, the Australian Transport Council (ATC) drafted a Marine Safety Strategy. The National Marine Safety Committee (NMSC) was established under an Intergovernmental Agreement (IGA)^{vii} to promote a uniform national approach to marine safety in Australia.

The NMSC subsequently prepared a final version of the National Marine Safety Strategy^{viii}, which was endorsed by ATC. The Strategy, as published in 1998, identified a number of strategic actions necessary to achieve and sustain a uniform national approach to marine safety. The Strategy and IGA set the framework for the reforms to achieve uniformity and mutual recognition.

The issues applicable to commercial vessel safety can be grouped as outcome driven and process driven. Outcome driven issues pertain to ‘what is to be achieved’. Process driven issues pertain to ‘how to achieve the agreed outcomes’. There are three main elements that determine outcome and process: legislation, standards and administration. The interrelationship between these is illustrated in Figure 1. Legislation specifies the outcomes required, either directly or by calling up specific standards. Legislation also puts in place processes to achieve those outcomes and specifies penalties for non-compliance.

The standard specifies safety outcomes, solutions to provide those safety outcomes and the methods for determining equivalent solutions. Administration sets in place a series of processes needed for achieving the required outcomes. If the standards are acceptable across all jurisdictions and the outcomes of the process meet the outcomes envisaged in the standards, then mutual recognition will be facilitated.

Figure 1—Flowchart of key elements for mutual recognition



Looking at the above model gives an insight as to why the USL Code failed to achieve the objective of uniformity and mutual recognition. It addressed only some aspects of the system. Legislation and administration were left largely unaddressed. While the USL Code did incorporate some quasi-legislative and process clauses in an attempt to fill the gap, these were frequently ignored when they came in conflict with enabling legislation or administrative policies. In fact, conflicts with legislation were sometimes cited at the very reason why the USL Code was not adopted in full by the enabling legislation.

LEGISLATIVE REFORM

The enabling legislation establishes both the applicable standards and the required processes. Legislation that is compatible in objectives and outputs amongst the various jurisdictions is fundamental to achieving uniformity and mutual recognition.

The Intergovernmental Agreement (IGA) between the States and Territories set out the following goals and guiding principles pertaining to legislation:

- (a) Legislation is made and continues to be made in a timely and consistent or uniform manner throughout Australia.
- (b) Legislation and marine safety standards comply with the "Principles and Guidelines for National Standards Setting Bodies and Regulatory Action by Ministerial Councils and Standards Setting Bodies"^{ix} endorsed by the Council of Australian Governments.
- (c) Changes in the legislation are proposed for consideration by the Parties from time to time and amendments are promptly and consistently made as the need for reform arises.

The Marine Safety Strategy requires the NMSC to develop and implement model legislation in a timely and consistent manner that enables the adoption of common or uniform standards and enhances mutual recognition.

The Thompson Clarke review noted:

".. a divergence in legislative drafting practice exists which can only be described as difficult for administrators and baffling to many lay users."

As an example of the barriers to uniformity and mutual recognition brought about through legislation is as follows: in some jurisdictions, the USL Code is adopted in full, in others it is adopted partially or as modified by the legislation, while in at least one jurisdiction, it is just one of a number of standards that could be applied.

Similarly, problems of mutual recognition are exacerbated by differences in the meaning of a Certificate of Survey within the legislative provisions of the different jurisdictions.

In NSW, the current Commercial Vessels Act^x requires the surveyor to ascertain whether:

"..the vessel is, or will be, designed, constructed and equipped to the satisfaction of the Minister and in conformity with any law applicable to the vessel."

The new NSW Marine Safety Act^{xi} which is yet to be promulgated states:

"A survey certificate is not to be granted for a vessel unless the Minister is satisfied that the vessel complies with relevant requirements as to design, construction and equipment and that the vessel is safe to operate."

In Queensland, the Transport Operations Regulations^{xii} require that:

"A certificate of compliance for a ship, or part of a ship, must include the appropriate declaration stated in schedule 1 about the seaworthiness of the ship or part."

The W.A Marine Act Regulations^{xiii} state:

"Upon receiving a satisfactory report from each surveyor performing the initial survey of a vessel, the Chief Executive Officer shall prepare a Certificate of Survey"

What constitutes a satisfactory report is not expressly defined in the WA Act, however, compliance with the USL Code as modified by the regulations is implied.

As a first step in reforming the marine legislation applicable to commercial vessels, the NMSC published a protocol for mutual recognition^{xiv} to serve as an interim measure while more substantive measures were being implemented. This protocol operates under the current legislative regimes. It is intended to streamline administrative process within the

limits imposed by current legislative requirements. A pilot study on mutual recognition is currently underway to review the effectiveness of these arrangements and to determine the nature and extent of issues that need to be addressed in legislation and administrative process.

The NMSC commenced the review of legislation by considering five different approaches for achieving uniform legislation. These are

1. Model Legislation.

A model of the legislation is used for drafting the legislation in each jurisdiction. Each State and Territory Parliament and the Commonwealth Parliament, if applicable, then enacts the legislation. Amendments to the legislation are made in each Parliament in the normal way. This method is consistent with maintaining the sovereignty of each Parliament as the legislation only has effect in a jurisdiction if enacted by the Parliament of that jurisdiction. However it has the disadvantage that it is sometimes difficult to maintain uniformity under this method either because the “model” legislation is varied when originally enacted or amendments agreed to later may not be enacted.

2. Template Legislation

Template legislation is a law enacted as the law of one State or Territory and then adopted as the law by the Parliaments of all other States and Territories. A Ministerial Council may agree to amendments to the originally enacted law, and an intergovernmental agreement may provide that the approval of a Ministerial Council is required before amendments can be made. An amendment to the originally enacted law usually applies automatically in each other State and Territory. Its advantage is that it provides a tight system as the law in a State or Territory will remain the same as the enacted template legislation without any action required by their Parliaments. Its disadvantage is that, with the exception of the State or Territory that passed the legislation, this method does not allow the full Parliamentary process to operate as the substantive and any amending legislation is not before the Parliament. It is seen as a surrender of jurisdiction sovereignty to the Parliament of the home of the template legislation, or to the sponsoring Ministerial Council.

3. Reference of Power

Under the Australian Constitution, the States may refer their power to the Commonwealth. The Commonwealth Parliament then enacts a law that overrides inconsistent State laws. Amendments to the legislation can only be enacted by the Commonwealth Parliament subject to the referred power being wide enough to support the amendment. The advantage of this method is that it provides a tight model, as the Commonwealth becomes the only legislating body. However, it results in a significant surrender of jurisdiction sovereignty by the States and Territories. There is doubt as to whether powers, once referred, can be reclaimed. While the reference of power is in force, States are powerless to vary the Commonwealth law. All existing State law which is inconsistent with the Commonwealth law is inoperative, and States cannot enact new legislation that is inconsistent with the Commonwealth law.

4. Mirror Legislation

Mirror legislation is legislation enacted by the States and the Commonwealth in identical terms. It tends to be used where there is uncertainty whether the law may be enacted by the States or the Commonwealth because of the questions of legislative power. The advantages and disadvantages are the same as those for “model legislation” except that it

has the benefit of achieving greater uniformity initially than model legislation and the disadvantage that the mirror legislation may not fit the specific conventions of legislative style and terminology used by each jurisdiction.

5. Model Provisions

The development of a series of model clauses that would facilitate the consistent adoption of respective sections of the USL Code as they are progressively reviewed. The model provisions usually comprise a list of core model provisions that all jurisdictions must agree to pick up, and a list of non-core model provisions that jurisdictions may modify when they pick them up so long as the desired national outcome is still achieved. The advantage of model provisions is that a complete Act or Regulation does not need to be drafted. The model provisions allow for amendments to existing legislation, and are introduced by each jurisdiction using its own legislative processes. The disadvantage of the model provision approach is that the provisions could be varied by a jurisdiction when introduced. In addition, the provisions may not be enacted by all jurisdictions.

The NMSC has decided to apply the “Model Provisions” approach to its work in reforming marine legislation. A project is currently underway to prepare drafting instructions for drafting the model provisions that will incorporate the first sections of the revised standards for commercial vessels.

STANDARDS REFORM

The current safety standards for Australian domestic commercial vessels are embodied in the USL Code.

The Marine Safety Strategy identified a number of strategic actions applicable to standards reform that included:

- (a) Develop and promulgate standards based on recognised and approved national and international standards for the design and construction of vessels.
- (b) Encourage the development of professional competence in vessel design, construction and survey.
- (c) Introduce and support performance based standards as an alternative to prescriptive standards.
- (d) Establish practices for assessing new technologies or operations in a timely manner and facilitate rapid transfer into standards.
- (e) Incorporate OH &S principles into design and construction standards.
- (f) Establish standards for crew levels and qualifications.
- (g) Encourage the incorporation of OH &S concepts and practices in marine training programs and in determining crew levels of fishing vessels.
- (h) Encourage vessel operators to recognise their duty of care to employees and passengers.

The review of the USL Code has been given a high priority in the NMSC’s work program. The above-listed strategic actions shape the review of the USL Code and will be reflected in the content and format of the new standards which have been given a new name; the National Standard for Commercial Vessels (NSCV). The NSCV will replace the USL

Code as the common national standard for the design, construction, crewing and operation of domestic vessels in Australia.

Note that the Marine Safety Strategy does not give a general mandate to raise safety standards. Any changes to safety standards must be justified on a cost/benefit basis within a Regulatory Impact Statement.

Objectives of the Standard

Discussions with various stakeholders indicated that there were significant differences of opinion as to the actual function of the standards contained in the USL Code. Some felt that compliance with the USL Code provided for “adequate” levels of safety, others felt that it set “minimum required” levels of safety. Inspection of the standards contained in the USL Code clearly shows that they cannot be said to always provide for adequate safety even in normal circumstances, let alone abnormal circumstances. At best the USL Code addresses certain major risks that tend to be generic across the industry or at least a sector of the industry. Its clauses provide for “minimum required” levels of safety.

The NSCV will explicitly state that it does not cover every aspect of safety. Any “safety gap” between the standards specified within the NSCV and those required to provide for adequate safety under Occupational Health and Safety Legislation or the general law is the responsibility of the person who has control over the relevant aspect of safety; be they the designer, builder, supplier, owner or operator.

A new innovation in the NSCV, relative to the USL Code, is that the key objectives of the document are explicitly stated in the document. These objectives are to:

- Protect the health and safety of persons from hazards arising from the operation of commercial vessels.
- Protect the environment from hazards arising from the operation of commercial vessels in the marine environment.
- Facilitate the transfer of vessels and the recognition of crew qualifications between Australian States and Territories.

The NSCV will promote a uniform national approach to the safety of commercial vessels and the protection of the environment by:

- (a) Providing information on the safety obligations and responsibilities of people who design, build and otherwise exercise control over the safety of commercial vessels.
- (b) Specifying nationally agreed minimum-required standards for vessel design, construction and equipment.
- (c) Specifying nationally agreed minimum-required standards for the issue of certificates of competency, and
- (d) Specifying nationally agreed minimum-required standards for the operation and crewing of vessels.

The NSCV will comprise six Parts. Table 3 lists the titles of each of these parts and the corresponding sections in the current USL Code. Five of these Parts contain requirements that are mandatory for compliance with the standard.

Table 3—Comparison between the NSCV and USL Code

National Standard for Commercial Vessels (NSCV)		Uniform Shipping Laws (USL) Code	
Part A:	Safety Obligations	Informative	New
Part B:	General Requirements	Mandatory	Section 1
Part C:	Design and Construction	Mandatory	Sections 5, 6, 7, 8, 9, 10, 11, 12, 13, 16
Part D:	Crew Competencies	Mandatory	Sections 2, 3
Part E:	Operation	Mandatory	Section 15
Part F:	Special Craft	Mandatory	Section 18, new sections for Fast Craft and Unconventional Craft

Key differences between the USL Code and the NSCV include:

- (a) clarification of safety obligations and safety outcomes sought
- (b) incorporation of performance-based approaches as an alternative to prescription
- (c) removal of clauses pertaining to process from the standard
- (d) replacement of Authority discretion by equivalent solutions,
- (e) easier to read format, based on styles used for other modern standards
- (f) updated content and deletion of outdated clauses.

These differences are best put into context by a description of the various Parts of the Standard

Part A

Part A aims to raise the awareness of all parties involved in the design, construction, supply, ownership and operation of commercial vessels to provide for the safety of persons and to work safely. These obligations currently exist under the various State and Territory OH&S Acts and in common law.

Part A does not establish or impose new safety obligations on the industry. It sets out in general terms information which describes these existing safety obligations in a form relevant to the commercial vessel industry. Part A is only for guidance and persons should still refer to applicable OH&S and other legislation for details of mandatory requirements.

Part A highlights to the user the wider responsibilities relating to the safety of a commercial vessel which should at all times be considered. It advises that compliance with Parts B to F of the NSCV by itself may not be sufficient to fully discharge these responsibilities, though such compliance should go a long way towards doing so. It reminds users that there is an onus on each party to identify hazards, analyse risks and control risks that are not adequately addressed by the NSCV, taking into account the particular circumstances of the vessel and its operation.

It is important to note that compliance with Part A is not required in order for a Certificate of Survey to be issued for a vessel or a Certificate of Competency to be issued to a person. However, it should discourage the “minimum is maximum” culture that is practiced by some in the industry.

Parts B, C, D and E

Parts B, C, D, E and F will specify minimum required standards for the design, construction, crewing and operation of domestic commercial vessels.

They will contain agreed required outcomes and technical solutions for the issue of certificates of compliance (e.g. Certificates of Survey and Certificates of Competency) by the various Commonwealth, State and Territory marine authorities. Compliance with Parts B, C, D, E and F will be mandatory for compliance with the NSCV and will be mandatory by law when made so by the applicable Commonwealth, State and Territory legislation.

The standards contained in Parts B, C, D, E are intended to control risks that are commonly found on most vessels. However, these standards will not be exhaustive, nor will they replace duty of care responsibilities described in Part A.

Part F

Parts B to E are intended for a wide range of ‘so-called’ conventional commercial vessels that we see operating in domestic service around Australia. Part F will contain requirements for special craft; i.e. craft for which the conventional requirements in Parts B to E are not properly applicable, at least without some modification. Standards for so-called Fast Craft will be contained in Part F. Requirements for larger seagoing fast craft will be based upon the IMO HSC Code. Requirements for smaller seagoing fast craft and those that operate in sheltered waters are currently under development. A safety case approach will be specified for Novel Craft such as Wing in Ground effect craft (WIGs). Part F will also provide standards for Hire and Drive Vessels.

Use of the standard

The NSCV is being written to allow flexibility in application while maintaining consistency. It does this by specifying performance in the form of required outcomes. While the required outcomes are mandatory, the means of satisfying those required outcomes are not fixed. Solutions may be either “deemed to satisfy” prescriptive solutions that are specified within the NSCV or equivalent performance-based solutions that are proposed by the applicant.

Figure 2 illustrates the framework of the NSCV and the options available to users.

Required outcomes

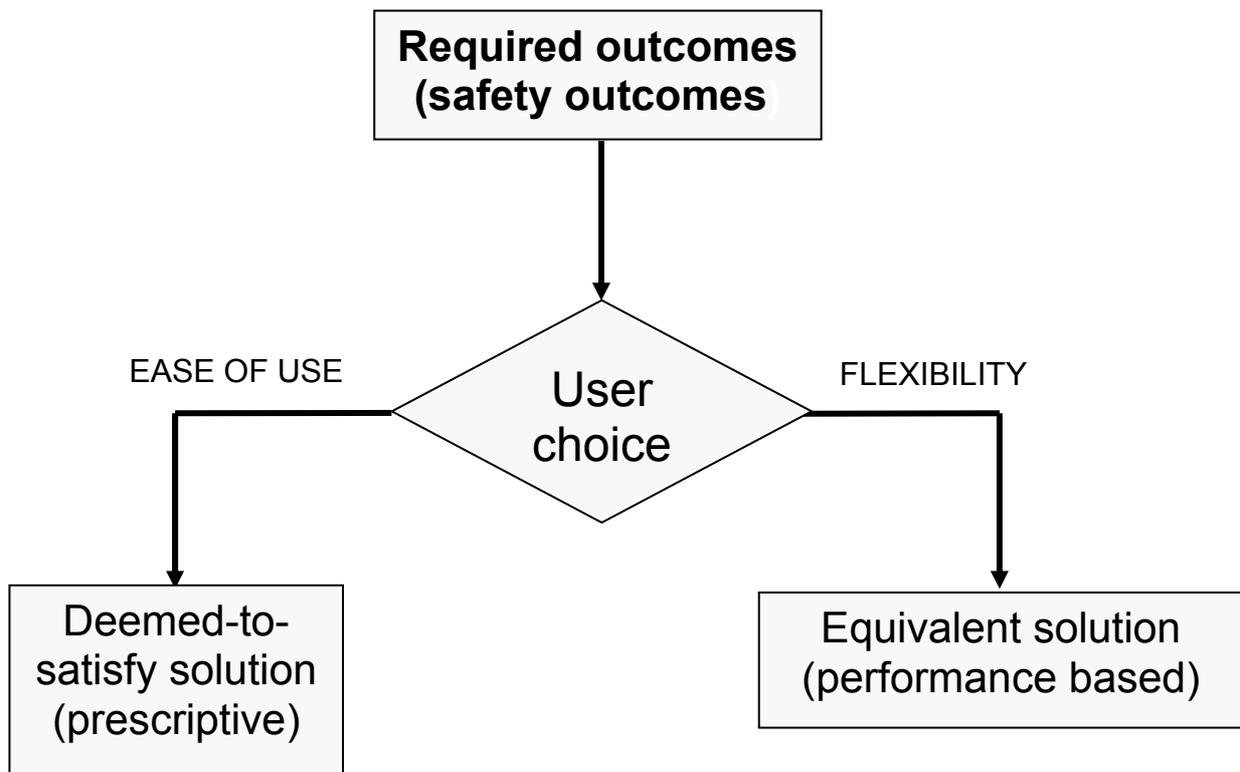
Required outcomes describe the safety outcome that is sought, the “why” behind existing requirements. What is to be achieved? The current USL Code does not generally specify required outcomes. They have largely been reverse-engineered from the current provisions of the USL Code. Compliance with required outcomes is mandatory for compliance with the National Standard. However, the degree of compliance may not be absolute, but rather relative to certain criteria.

“Deemed-to-satisfy” solutions

Deemed-to-satisfy solutions are solutions for controlling risk that are prescribed within the standard. They are deemed to satisfy the required outcomes; i.e. proof of compliance with the required outcomes is not required. Deemed-to-satisfy solutions are largely based on the content of the current USL Code. In the absence of other criteria, the performance of a deemed-to-satisfy solution provides a benchmark for assessing equivalent solutions.

The benefit of adopting a ‘deemed to satisfy’ solution is that there is no onus on the applicant to prove compliance with the corresponding performance standard. The convenience of this option comes at a cost in that flexibility in the solution is limited.

Figure 2—Flowchart for performance-based approach to vessel certification



Equivalent solutions

Equivalent solutions are solutions that achieve the required outcomes by means other than that which is “deemed to satisfy”. An equivalent solution must be “proven to satisfy” the required outcomes, either directly or by showing its performance is at least equivalent to that of the “deemed to satisfy” solution.

The benefit of using an equivalent solution is that it greatly increases the options available for achieving the required outcome, allowing for innovation and the adoption of new technology. However, in adopting an equivalent solution, the applicant must bear the onus and cost of proving that the equivalent solution meets the applicable required outcomes.

The “deemed to satisfy” solutions specified within the NSCV provide an integrated safety system that combines a vessel’s technical characteristics, operator competencies and safety management procedures to control risk. When formulating an equivalent solution, elements of the safety system must not be altered without considering the potential impact on the effectiveness of the safety system as a whole.

Stakeholder involvement

A key aspect of the NSCV is that it is being developed with significant stakeholder involvement. An Industry Advisory Committee with representatives of major industry sectors provides advice to the NMSC on broad policy issues. Issues papers, workshops and reference groups provide forums for both industry and government to steer and participate

in the direction of the review and drafting of the individual Parts and Sections of the Standard.

A Regulatory Impact Statement (RIS) is prepared that explicitly states the rationale behind the review of each Part or Section, the changes that have been made, the anticipated effect on stakeholders and the cost / benefit of changes.

Both the draft and the RIS are then offered for public comment for a period of 2 to 3 months. Comments received are reviewed by a reference panel comprising both industry and government representatives, the panel making recommendations to the NMSC for approval. The draft standard and the RIS are then amended in accordance with the NMSC approval. The final draft and RIS then go through a series of approvals that eventually leads to the Council of Ministers (ATC).

Stakeholder involvement is a key element in the review process. The process by which stakeholders participate is not quick and consensus can sometimes be elusive. However, its benefits are that the end result should be documents that all can at least learn to live with, if not love. In order for the process to work, all stakeholders must be prepared to make some compromises, even if it requires an easing of position in the interests of the overall national benefit.

Effect of the new National Standard

The transformation of the USL Code into the NSCV does not signal a revolutionary change in the safety obligations and safety requirements in the commercial vessel industry. A close inspection of the new sections will reveal many familiar clauses, perhaps expressed in a different way and updated to reflect modern practices, but familiar just the same.

Likewise, the concept of performance-based approaches is nothing new. For many years, surveyors have been called upon to consider alternative arrangements under exemption clauses. The main difference will be the focus placed on objective analysis and auditable documentation of the decision to facilitate mutual recognition of a performance-based equivalent solution.

The review of the NSCV is more about changing the way that people think about, interpret and meet their existing safety obligations, rather than changing or adding to those obligations.

The NSCV will provide better opportunities for innovation by focusing on safety outcomes rather than specific prescriptive solutions. It will also provide the vehicle for identifying and achieving those outcomes in an objective and consistent manner to facilitate national consistency and mutual recognition.

Progress to date

The process of reviewing the current USL Code and drafting the NSCV has been the major focus of the NMSC's activities over the last 4 years. Considerable effort has been directed to developing the overall concepts, review processes and style; as well as the painstaking business of finding consensus between stakeholders having a wide range of views and needs.

Work is nearing completion on Part A—Safety obligations, Part B—General Requirements, Part C Section 5—Engineering and Part D—Crewing and Competencies. Work is well advanced on Part C Subsection 7A—Lifesaving equipment and Part F

Section 1 Fast Craft. Work has also commenced on Part C Section 4—Fire safety, Part C Subsection 6B—Intact Stability and Part E—Operations.

The first Sections should be published in mid 2002.

ADMINISTRATIVE REFORM

The third leg to the reform process is Administrative Reform.

The Intergovernmental Agreement (IGA) between the States and Territories set out the following goals and guiding principles pertaining to administration:

- (a) Legislation is administered consistently to achieve, at least, an agreed standard of marine safety,
- (b) There is a minimum of procedural differences in marine safety administration throughout Australia,
- (c) There is mutual recognition of each other's administration of marine safety.

The Marine Safety Strategy requires the NMSC to develop appropriate standards and arrangements (processes) which provide for consistent legislative and operational marine safety practices in all jurisdictions, including national verification and certification.

In regard to administration, the Thompson Clarke report observed:

There is evidence that the political will at government level in all jurisdictions to fully develop integrated administrative arrangements and mutual recognition of outcomes has not yet been absorbed into the maritime safety administrative field."

An important barrier to mutual recognition identified in the Thompson Clarke report and subsequently acknowledged by the NMSC is an underlying lack of confidence in the survey arrangements of each others' jurisdictions.

The report noted that the main gaps in uniform adoption of agreed standards relate to areas where there appear to be significant differences of opinion on administrative philosophy, objectives and desired outcomes.

The Thompson Clarke report further observed:

"Mutual confidence at the administrative level in the concept of uniformity and mutual recognition has been eroded by a series of non-standard events. There are several recorded cases of technical decisions approved by all Ministers not subsequently being adopted in certain jurisdictions, upgrades of USL standard have in some instances not been applied after adoption, and all jurisdictions can point to significant areas where some others do not apply sections of the USL Code."

The USL Code contains provisions that were intended to reform administrative process. Administrative decisions that varied standards from those contained in the USL Code were supposed to be circulated through a Secretariat. This was never fulfilled.

The above indicates that Administrative reform is an essential component of any attempt to improve uniformity and mutual recognition.

In particular, administrative functions often determine State or Territory policies (both generic and local), exemptions, local rules, quantity and competence of staff, financial resources and quality.

For example, despite being specified in Section 14 of the current USL Code, methods and approaches to the survey of vessels have varied widely between jurisdictions. Some require full compliance with Section 14, some partial compliance to Section 14, some extend the dates for periodic inspections, at least one permits a degree of self-certification.

The NMSC is considering the possibility of replacing Section 14 of the USL Code with a National Standard for the Administration of Marine Safety applicable to the jurisdictions. Again, this would likely be outcome rather than solution driven, and would probably specify “deemed-to-satisfy” solutions. The focus would be more on whether the outcomes of the survey process are achieved rather than concentrating on the specific processes that are used (the latter possibly presented as a deemed-to-satisfy solution). Such a standard may include requirements for quality management and external auditing to establish confidence that the safety outcomes implied by the issue of a certificate of compliance are indeed being delivered.

Since the Thompson Clarke report was released, a number of Marine Authorities have implemented quality management systems to improve the quality of their operations. Western Australia has been accredited to ISO 9002 and the Waterways Authority (NSW) will be seeking accreditation in the near future. Other marine authorities have been actively investigating the possibility of adopting similar quality systems.

Administrative arrangements will be improved by clearer statements of objectives and required outcomes that are to be expressed both the standards and enabling legislation. Such clarity should require less administrative interpretation.

The NMSC has commenced the publication of National Guidance material to assist both the administrators and those interacting with administrators. Guidelines have been published on the recognition of Australian defence force qualifications^{xv} as well as other topics pertaining to commercial vessels and recreational boats.

As already mentioned, the NMSC has instituted an administrative protocol for mutual recognition to improve processes as an interim measure while the legislative reform process is underway.

Another administrative reform has been the revamping of the national system for the registration of complaint equipment. The NMSC has instituted a system that incorporates modern requirements for conformity assessment and quality, as well as better addressing product liability issues. The register is now available for ready reference on the internet^{xvi}.

CONCLUSIONS

Regulatory reform in the Australian domestic commercial vessel industry requires a multi-pronged approach to achieve its objectives of uniformity and mutual recognition.

The NMSC, guided by the National Marine Safety Strategy, is working toward reform in the three key elements: legislation, standards and administration. In carrying out this work, the NMSC is actively seeking to confer and find consensus between the various stakeholders within the industry.

Significant progress has been made in the reform of applicable standards. Through the provisions of the NSCV, the NMSC seeks to promote a better understanding of existing safety obligations and the underlying safety rationale behind those familiar prescriptive solutions. In a world that is getting more sophisticated and complex, simple prescriptive solutions alone are not able to keep pace with changes in technology. The inclusion of

required outcomes in the NSCV better allows for the development of alternative solutions that provide for equivalent safety.

The challenge that is faced in reviewing safety regulation in Australia is to devise a system that delivers appropriate levels of safety and is sufficiently reliable and transparent to promote confidence, uniform to avoid conflicts in safety outcomes, represents consensus between stakeholders to ensure commitment, efficient to be economically sustainable and at the same time is consistent with the sovereign power of the various governments involved.

The reform of legislation and administrative processes in particular, is a challenge to the Marine Authorities, requiring them to balance the issues of sovereignty with those of uniformity. Similarly parochial issues and long-standing policies have to be balanced against national objectives. The Marine Safety Strategy and the IGA highlight the political will of Government to reform legislation and administrative process. The NMSC is now working to deliver these outcomes.

ⁱ National Occupational Health and Safety Commission. Work-related fatal injuries as a result of fishing and maritime activities in Australia, 1989 to 1992. Sydney. June 1999.

ⁱⁱ Commonwealth of Australia Constitution Act. (1901)

ⁱⁱⁱ European Union webpage <http://europa.eu.int/scadplus/leg/en/lvb/l24245.htm> 14 Mar 2001

^{iv} Industry Commission. Work, Health and Safety. Inquiry into Occupational Health and Safety. 1995 Commonwealth of Australia.

^v Commonwealth of Australia. Uniform Shipping Laws Code. 1979. Australian Govt Publishing Service (subsequent revisions in 1981, 1984, 1989, 1993, 1996 and 1997)

^{vi} Thompson Clarke Shipping Pty Ltd. Review of Maritime Safety Arrangements in Australia, 1995

^{vii} Agreement between the Commonwealth of Australia, the States and the Northern Territory Establishing a National Marine Safety Regulatory Regime. Nov 1997. <http://www.nmsc.gov.au/documents/agreement.pdf>

^{viii} National Marine Safety Committee. National Marine Safety Strategy. Aug 1998 <http://www.nmsc.gov.au/documents/strategy.pdf>

^{ix} Council of Australian Governments. Principles and Guidelines for National Standard Setting and Regulatory Action by Ministerial Councils and Standard-Setting Bodies 1995 (amended 1997) <http://www.dpmc.gov.au/pdfs/coagpg.pdf>

^x Commercial Vessels Act (NSW) 1979 – s16(1)

^{xi} Marine Safety Act (NSW) 1998 - s54(1)

^{xii} Transport Operations (Marine Safety) Regulation (Qld) 1995 s47(1)

^{xiii} W.A. Marine (Surveys and Certificates of Survey) Regulations 1983 s11(1)

^{xiv} National Marine Safety Committee. Administrative Protocol for the Mutual Recognition of Vessel Certificates of Survey. Edition 1. Jan 2000. <http://www.nmsc.gov.au/documents/protocol.pdf>

^{xv} National Marine Safety Committee. Guidelines for Recognition of Australian Defence Force Marine Qualifications. Nov 2000. <http://www.nmsc.gov.au/documents/adf.pdf>

^{xvi} National Marine Safety Committee. Register of Compliant Equipment. <http://www.nmsc.gov.au/nrce/>