

Performance, Outcomes and Results  
The MET Network with NGO Observer Status at IMO

# GlobalMET NEWSLETTER



To promote, develop and support in the spirit of cooperation, the common interests of its members in all matters concerning the development and quality of maritime education and training.

[www.globalmet.org](http://www.globalmet.org)

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Editorial Board:

Iman Fiqrie  
Malaysia

Chris Haughton  
United Kingdom

Richard Teo  
Australia

Rod Short  
New Zealand



# Editorial

**A**nother year has gone and past; many of last year's resolutions may have gone unresolved.

Last year's January 2015 Editorial, for example, started out brightly with a new look and cover for the newsletter, as does this year's. Some high points were starting strong with Climate Change and finishing strong with the culmination of the World Climate Change Conference 2015 in Paris and following initiatives.

Last year the newsletter also asked Maritime Education and Training (MET) to lean forward, promote its common interests in all matters concerning the development and quality of MET. What's the verdict? Has all the training achieved the required results as intended with higher performing crews, operations and less accidents? The presumption being that training is the fix to end all ailments.

On that note, in the first two weeks of 2015 alone, there were no less than 14 catastrophes covering collisions, groundings and such, costing the loss of no less than 12 souls and fallen seafarers. By the end of 2015, there would be more than 110 recorded catastrophes; may their souls rest in peace, dedicating again, *Eternal Father: The Navy Hymn*. In 2014, there were at least 106 recorded catastrophes. Looks like things are getting worse, not better! Is it possible that we now need to look at a systems approach to this problem vice training as the cure for all maritime ailments? Maybe in 2016, MET can address and look at the systems approach to Human Performance Improvement (HPI) at the organization, process and job levels (I, II, III). The systems and process levels may be responsible for as much as 80% of the problem.

Other articles and initiatives covered in 2015, included the Principled Seafarer; compliance with the Rules of the Road (ROR); Engine Watchkeeping; the contribution of women and women seafarers to the maritime industry (intend to do more of this); Leadership in the maritime industry, digital technology, learning and development; Japanese National Institute (we need more articles like this); and lastly, more on competency, industry challenges, change management, culture and training, mentoring, maritime labor, environment, Polar Navigation, professional development, Off-Shore Vessels, workshops, simulators and human factors (stress, etc.).

In essence and the opinion of the Editor, 2016 needs to see more maritime leadership, vision and resolve! Save the IMO, whose websites (Knowledge Center and Current Awareness) are full of great information. Accordingly, it just wouldn't be right to

make accusations and not provide a bit of leadership and vision oneself, so here goes. Borrowing from the "Digital Policy Priorities Statement" (DP2S) from the Australian Government, "Neither governments nor industry can afford to stand still in a world of competition and opportunity" (Forward). Digital technology is and will continue to transform global economies and landscape. "The digital economy is a global economy" and is comprised of several key areas for both private and government as follows:

1. Digital leadership and culture
2. Legal, regulatory and standards frameworks
3. Infrastructure investment
4. Reliable, secure and safe environment
5. Education and skills
6. Innovation
7. Global integration

*(Australian Industry Group)*

There is almost nothing these days that doesn't have a chip in it and almost everyone has a Smartphone. From A-Z, technology is all around us and waiting for us to embrace, capitalize and get onboard with it – to become Digital Citizens and participants in the transformation that is and will continue to take place with or without us. One doesn't want to be left behind and out of work this time around. Again, the work of the IMO with regards to safety, security, cleanliness and energy efficiency is still relevant, however, technology now frames this IMO motto.

The purpose of the Digital Priorities and technology in an IMO context amounts to HPI and change management at the organizational, process and job (performance) levels. We all know change is the only thing that is constant and inevitable, addressing the current skill gaps can and will be overwhelming; barriers are set and hardened against change as high as that of Mount Everest.

Many Captains expressed their views on the future and priorities of MET and industry; from Ballast Water Management, environment, air quality emissions, to recruitment, attitudes, seafarer stress, IMO and why so many accidents. Thanks for their contribution, thank you for reading, God's speed and blessing as we embark on these 2016 challenges, initiatives and opportunities – see you there and on the [globalmetsblog.imanfiqrie.com!](http://globalmetsblog.imanfiqrie.com!)

For the Executive Secretary,

By

**Iman Fiqrie Bin Muhammad** (LCDR, USN ret)  
Lecturer, Malaysian Maritime Academy



## The Teaching of MET



**M**y retirement, which was intended for the end of last year, has been deferred until the next Board meeting, probably in April. I am rather pleased. Also, I am delighted to hand over editing of this monthly newsletter to LCDR Iman Fiqrie of Akademi Laut Malaysia, who has made a significant contribution and will continue to do so, though in the combined role of editor and contributor.

GlobalMET has been in existence for 20 years. It got under way at a meeting in Hong Kong in 1996 and grew steadily over the next few years, to reach a plateau of some 90 member institutions in 33 countries. Also there have been some 30 Associate and Individual members. It has dropped back a little to 88 member institutions and 21 associate and individual members.

After lobbying the members of IMO at various meetings in London and Copenhagen during the previous two years, membership as an NGO with observer status was approved by IMO in 2009. We have been at all STW and HTW meetings since then. It is good to see the teaching institutions participating.

We also participate in conferences and seminars, our own and organised by others. The next is currently planned for Guangzhou in April. An Indian GlobalMET Chapter has been formed. Initiatives are taken with the teaching of teachers in the Philippines, where three courses funded by the TK Fund have been conducted - there are more to come - and with the application to the Asian Development Bank. More initiatives will be taken.

There is so much to do. Technology is impacting on the industry at an accelerating rate and the needs for maritime education and training are changing in response. Yet we struggle for funds. One gets the impression that we are regarded as yet another network, talking but not doing. A lot of effort is required to get the many non-member MET institutions to join. A lot of effort is required to get the members to make significant contributions. Some do, but too many don't.

The courses in the Philippines were for the teachers from a number of academies to learn the principles and methodologies of outcome based education and competency based education, training and assessment. Rubrics for assessment must satisfy the rules of evidence of OBE and CBETA. Learning programs need to be structured and designed to specific performance criteria within a quality training framework. That leads to the learners being able to demonstrate their knowledge, skills and ability to the required dimensions of the tasks that satisfy the competences described in STCW.

This newsletter is another example. Each month contributions are received from a dedicated group of authors - for example the contributions from the faculty of ALAM (Academy Laut Malaysia), from Richard Teo and from Mahendra Singh. It is a pleasure to receive them. Let us have more. It used to be a hard copy newsletter but is now online and relatively easy to produce and distribute. Let's reach towards having our newsletter full of ideas about developing MET.

You will notice the new cover this month, which we intend to retain throughout the year. Also, on the cover, is a new mantra:

- 'Performance' entails the actions and behaviours of the candidate;
- 'Outcomes' of those behaviours may or may not be linked to the business goals;
- 'Results' are directly linked to business goals, are needed and prioritized.

It appears there is a serious and growing shortage of competent teaching staff in many MET institutions. How many of your faculty are truly competent? Is your institution experiencing difficulties recruiting? If they join, do they stay long or instead use it as a stepping-stone to a better (?) job ashore? Is it becoming more dependent on part-time staff - on seagoing officers on leave? How are we to address this shortage? We must.

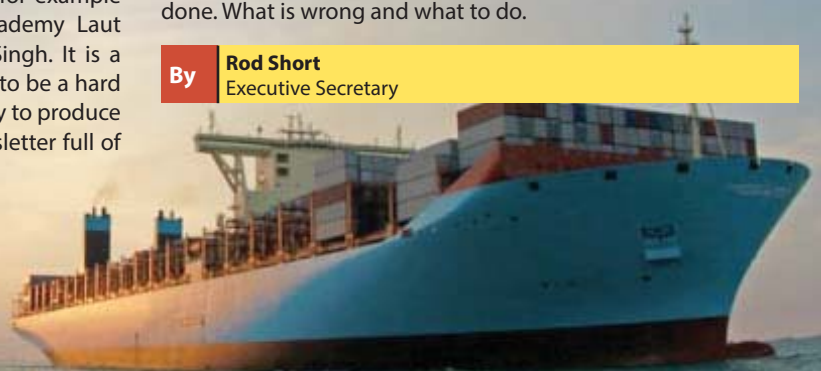
We must move away from the chalk and talk approach to teaching. We need to embrace modern learning methodologies. More online teaching and assessment is needed for the student at sea and ashore. We must have more blended learning. We need to listen to the younger generation. At a recent GlobalMET seminar we had 12 students - 'Generation Y' - on the stage telling us what they needed. One of them, a bright female student - and the number is increasing - addressed me and said 'we think of you as 'Generation G' - 'Gen G'? - 'yes G for Geriatric'. There are many implications in that statement.

We need centres of excellence, quality nodes which are clearly places for teachers and students to refer to, to attend courses, to participate in conferences and seminars, to attract the best and most knowledgeable in the latest learning methodologies and prepared to pass the knowledge on. In other words to lead development. Why can't there be centres of excellence in maritime teaching sited in several places?

The use of MET is appropriate - maritime education and training. Our maritime students should be learning about the ocean so that they develop lifelong interest. It has many facets, but before branching into the study of one of these, students should be introduced to the fascination that a broad study of the oceans provides. Certainly they are intended to work in the operation of ships, but in the event that they want to change, they will already have a broad knowledge.

So what to do? Let GlobalMET advocate formulation of a correspondence group in the industry to identify what is wrong with MET and make recommendations as to what needs to be done. What is wrong and what to do.

By **Rod Short**  
Executive Secretary



# Continuing Professional Development, CPD Workshops 2015



## Executive Summary

This final report on the proceedings of the CPD workshops that were facilitated in September 2015 brings home a very strong message. This message is:

The practice of Maritime Education and Training continues to grow and improve well in the Philippines. The following however, are concerns:

- Traditional knowledge based delivery methods continue to linger over, causing resistance to change to Outcome Based Education – OBE, embracing Competency Based Education Training & Assessment, CBETA the preferred and prescribed methodology in the current STCW Convention.
- One cause is the insistence by many unknowing auditors that the Model Courses be the benchmark. The model courses are regrettably not competency based learning despite the recent reviews that mainly changed certain words and expressions to mean competency based approach. These model courses are knowledge based, traditional pedagogy (children) with emphasis on didactic, teacher centred delivery, copious notes-taking to be committed to memory, privileging examinations that are almost entirely knowledge based, subjective with no performance or learned outcomes. Grading methods do not assess competences and rubrics do not satisfy the rules of evidence for competency based assessments.
- The use of Model Course 6.09 for teacher training emphasizes traditional teacher centred delivery, quite unsuitable for professional adult education that demands performance to universal standards.

## Workshop Strategies

With the above concerns in mind, the structure and design of the CPD concentrated on firstly enabling participants to cross borders and comfort zones from traditional delivery to competency based delivery. This entailed considerable unlearning and re-learning and doing, for participants to cross over via Action Reflection Learning principles and activities. Participants learned to provide for adult learning methodologies, i.e. andragogy.

The participants learned in work groups, leading their own learning and doing in accordance with the programme plan. Each group then produced their outcomes and presented to the audience consisting of all other groups. It is important to note that learning materials, research materials were given to all participants at least 2 weeks before commencement. A flipped class room environment existed. Learners were at liberty to use the internet for further research if required in an action research environment where collaborative learning was a tool.

Andragogy is learner centred methodology where adults self-manage their learning, awareness, conceptualisation and self-

determination. Participants also were exposed to Heutagogy, an extension of andragogy that takes in eclectic learning, double loop learning and doing in the multi learning spaces that exist today, virtual, non-virtual, media and so on.

This is a departure from horrid class rooms in a sterile and controlled scenario where teachers rule the learning (didactic) with little or no ideas on learning styles and facilitating styles to adapt to the learners' learning styles.

It was then followed up with six core competences, described in the learning programme. Each participant must transfer to their co-workers whilst exercising the new curriculum or learning and assessment strategies they would implement on completion of the workshop and report back later at the monitoring and surveillance phase.

This workshop provides the platform for MET teachers to become professional facilitators who have become cognisant of educational methodologies in OBE and CBETA. They would then facilitate the learning and assessment strategies at their work-places be it school based (off site) institutions or at the work-place (on site), i.e. ships and craft.

## Presentation by Participants

Each batch had elected their team leaders at the end of the first phase (5 days) workshop. They departed with specific criteria to design, implement and result their competency based curriculum.

The team leaders and key team members presented their results to GolabIMET members and Board directors on November 11 prior to Crew connect. Unfortunately they did not have the opportunity to show case their work at the conference.

A temporary blog site was set up by the two batches to monitor and exchange ideas, learning and activities in the preparation of project finalisation and presentation. This was an immensely successful communications outcome that complemented the facilitation of the CPD programme.

The results of each batch and their revised curriculum is expected to be forwarded to MARINA, the national marine safety authority in due course for their perusal and eventual approval for use in their institutions. The outcome for these workshops ultimately will be a standardised training and assessment programme that the Philippines can lead the region with.

## Final CPD Workshop in 2016 March

The final workshop will be facilitated in March 2016 at Manila. Watch this space.

## Credits

These workshops owe their success to, **TK Foundation** who kindly provided a grant to deliver this training. **VADM Eduardo Ma Santos, President, The Maritime Academy of the Asia Pacific (MAAP)** kindly hosted the CPD programme.

The success of these CPD programmes delivery are due very largely to my co-facilitators;

**Professor Dr Angelica Baylon** PhD AFNI – she was also programme administrator.  
**Dr Chris Haughton** EdD, FNI Master Mariner.

By **Capt. Richard Teo**  
FNI FCILT MAICD



## Marine Simulators – A Brief Description



Figure 1 - Liquid Cargo Simulator

In GlobalMET Newsletter No. 50, I shared ALAM's experience with Engine Room Simulators (ERS) from ALAM's beginnings which included some introductory material on ERS as well. In this newsletter, what I would like to do is to discuss more on Marine Simulator standards, functionality and use from a Standards of Training, Certification and Watchkeeping (STCW) point of view. Let's get started!

There should be appropriate interfaces through which the trainees are able to interact with equipment in a simulated environment.

According to the DNV Simulator Standards these simulators can be classed under 4 categories, namely:

1. Class A (full mission).
2. Class B (multi-task).
3. Class C (limited task).
4. Class S (special tasks) is used for simulators where the performance is defined on a case by case basis.

Besides class, Marine Simulators can also be further divided based on function, namely:

1. Bridge operation simulator
2. Machinery operation simulator
3. Radio communication
4. Cargo handling simulator
5. Dynamic positioning simulator
6. Safety and Security simulator
7. VTS (vessel traffic services) simulator
8. Survival Craft and Rescue Boat Operation simulator
9. Offshore Crane Operation simulator
10. Remotely Operated Vehicle Operation simulator

In the context of maritime training, the simulators are normally used for:

1. Mandatory simulator-based training.
2. Demonstrate competence (assessment).
3. Demonstrate continued proficiency.

According to STCW Code, section A-1/12 these simulators should fulfill 6 general performance standards and requirements for both training and assessment, namely:

- Suitable for the selected objectives and training tasks
- Capable of satisfying the specified assessment objectives
- Capable of simulating the operating capabilities of shipboard equipment to level of physical
- Realism appropriate to training and to the assessment objectives
- Sufficient behavioral realism to allow a trainee to acquire the appropriate skills and to the
- Assessment objective

- Capable of producing a variety of conditions (operating environment) which include
- emergency, hazardous or unusual situations relevant to the training objectives.

An appropriate interface through which the trainee should be able to interact with equipment in the simulated environment.

The instructor/assessor should be able to control/monitor/record exercises for the effective debriefing relevant to the assessment objectives.

Of course the qualifications of instructors, supervisors and assessors also plays a very crucial role in ensuring that the simulators are used effectively to achieve their intended training outcomes; note the difference between objectives, outcomes and business results. For example, just because an individual appears to have exhibited certain behaviors doesn't mean that they can be assessed as having achieved the required outcomes – two different things; especially if the simulators cannot properly simulate the right or realistic environment.

Therefore, any person conducting in-service training of a seafarer, either on board or ashore, which is intended to be used in qualifying for certification shall:

1. have an appreciation of the training programme and an understanding of the specific training objectives and required outcomes for the particular type of training being conducted.
2. be qualified in the task for which training is being conducted.
3. In addition, if conducting training using a simulator:
  - 3.1 has received appropriate guidance in instructional techniques involving the use of simulators,
  - 3.2 has gained practical operational experience on the particular type of simulator being used; and
4. Any person responsible for the supervision of in-service training of a seafarer intended to be used in qualifying for certification under the Convention shall have a full understanding of the training programme and the specific objectives and outcomes for each type of training being conducted.

Also, any person conducting in-service assessment of competence of a seafarer, either on board or ashore shall:

1. have an appropriate level of knowledge and understanding of the competence to be assessed.
2. be qualified in the task for which the assessment is being made.
3. have received appropriate guidance in assessment methods and practice.
4. have gained practical assessment experience; and
5. if conducting assessment involving the use of simulators, have gained practical assessment experience on the particular type of simulator under the supervision and to the satisfaction of an experienced assessor.

Lastly, the use of simulators for training can best be summarised by the following quote.

TELL ME AND I SHALL FORGET  
SHOW ME AND I SHALL REMEMBER  
LET ME DO IT AND I SHALL UNDERSTAND

— Chinese proverb

By **Mr. Gan Boon Song**  
Senior Lecturer ALAM

# What is Competence and or Competency?



In the last issue of this Newsletter, a summary of the Crew Connect 2015 presentation on “Managing the Learning Environment” expressed the views of the audience, prompted by presenters, Paul Russel, Glenys Jackson and Richard Teo. What was most apparent was that, a good proportion of the highly knowledgeable and experienced audience was not fully informed as to what competence or competency in maritime education and training (MET) really entailed.

It is easy to express doubts about someone’s competence or lack of it but really how fair or justified are we when we make such statements?

A competency is simply defined in terms of,

- what a person is required to do well (performance), at the work place
- under what conditions it is to be done (expected work place conditions) and
- satisfies or meets the exemplar (benchmark – standards e.g. STCW convention)

If you take in the feedback and information that has been circulating about how mariners and aspiring officers do not meet expectations on the job, this indicates that there are issues in the learning and doing processes and expectations at the work place. There are issues also in how people perceive standard of competence and how competences or skill- sets are performed at the work place.

The cause appears to be the manner in which, knowledge, skills and attitudes (basic components of competence) are transferred from the expert to the learner at the institution, at the work place and other sometimes dubious learning spaces. It is important to realise that each level of competence or competency comprises the exact transfer of the sufficient requisite knowledge, attainment and practice of the skills for the functions, tasks and roles that the knowledge underpins and then applying those knowledge and skills with the right accompanying attitudes, that is correct, safe, timely and economical to the scope of work to be performed and completed at hand and consistently throughout the person(s)’ career.

The concept of competence includes all aspects of work performance - not only task skills. The assessment of competence involves a demonstration of competence(s) (knowledge, skills, and attitudes) in all of the dimensions of the competence:

- Task skills
- Task management skills
- Contingency management skills
- Job/role environment skills
- Transfer competences to others Including
- Underpinning Economic & commercial application skills.

## Transfer of Competence

As the term implies, competence is the praxis that mariners must possess when performing at the work place, afloat and

ashore. Yet feedback indicates that there are deficiencies. Many MET institutions put learners through intensive teaching, learning and study programmes culminating in lengthy examinations with secret questions. These study programmes are almost entirely subject oriented, knowledge based and subsumed through rote and memory. Successful graduands then head to sea and pick up the finer points of seamanship prior to becoming ships’ officers, deck and engineers. Many graduands fail to recognise any connections with what they have learned (learning objectives to subjects - knowledge) at the institutions and what they have to do at sea (learned work outcomes – performance standards and competences – knowledge, skills & attitudes).

It stands to reason that competency based education to learning, training and assessments, (CBETA) as required by the STCW convention, as the preferred way to proceed may not have become praxis. Latterly, the Philippines Maritime Authority, MARINA and the Commission for Higher Education, (CHED) have mandated outcome based education (OBE) as the methodology for transfer of competences. OBE encompasses CBETA. CBETA and OBE are very sophisticated methods of programme delivery. It embraces adult learning methods (Andragogy) as against previous traditional pedagogy (children). In recent times heutagogy has become quite prominent due to advent of media learning and the internet of things (IOT). Some distinctive characteristics are,

- Delivery is learner-centred where learners become self-directed, self-managed and accountable for their learning.
- Teaching staff now have a greater responsibility to ensure that all learning and doing is transparent and efficient in the management of learning resources, environment and spaces.
- Teaching staff too must be updated and valid with competency based teaching and assessment qualifications and skills.

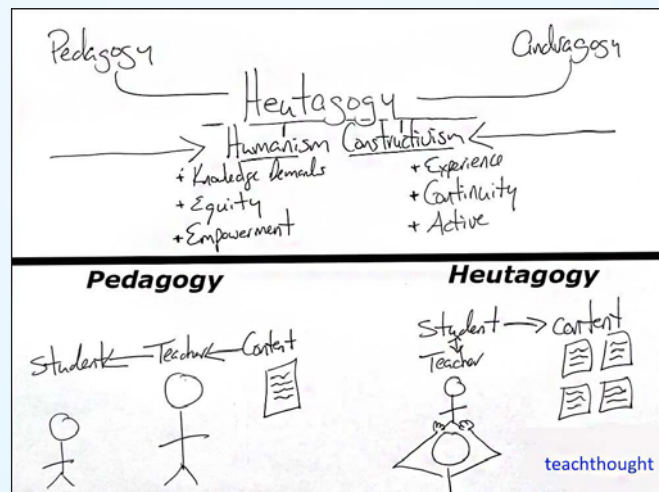


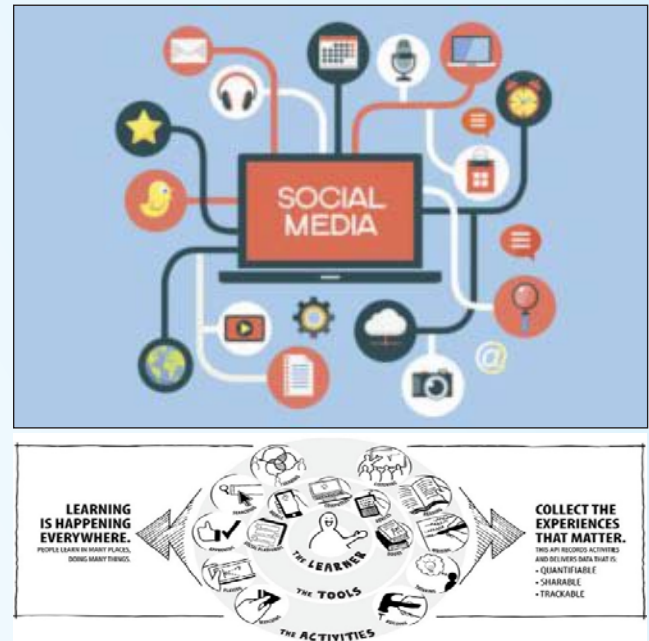
Figure 1 - From Pedagogy to Andragogy and Heutagogy

- There is a shift in paradigm that crosses cultural borders and mindsets. Unavoidably, there has been much resistance to change when you count how many MET intuitions still deliver the traditional way, despite CBETA being the preferred methodology since the 1995 amendments.
- Learning and doing must have outcomes that are demonstrable under rigorous assessment rubrics and methods.

It is important to realise that teaching is not just about class room techniques and methodology. There will be little or no rote. Certainly the didactic teacher standing in front of the room will become a thing of the past. Volume of learning facilitated by the teacher must match the assessments that must be conducted using agreed universal assessment tools and rubrics that are fair and rigorous. These rubrics set the measure against the standard performance criteria (criterion referenced) and foundation skills, not graded knowledge and information (cognitive) only. All learners and assessors must work together on the requirements of each competence(s) assessment and all requirements-outcomes fully and clearly made known and available during the assessment. These assessments are transparent and conducted (Rules of Assessment) progressively, not at the end of each term or semester. The principal three domains of learning (Blooms Taxonomy), cognitive, psychomotor and affective must be assessed and clearly indicated as "Evidence" for each competence or sets of competences (Skills set) that are assessed and achieved. It is imperative that each assessment is based on the published performance criteria and foundation skills. Competence is only attained when

each performance criteria accompanied by the foundation skills have been met in full.

Availability of the teacher(s), facilities and teacher skills in facilitating learning and doing must also extend beyond the class room. See Figure 2 – Learning Environment.



(Source - Tin Can API.)

Figure 2 - Learning Environment

More on these in my next article, "Untangling the Competence Dilemma".

By **Capt. Richard Teo**  
FNI FCILT MAICD

## Training not Required!

Highlight

by **Iman Fiqrie**

Things not going so well in your organization? Performance improvement (HPI) an issue? Research indicates that more than 80 percent of performance problems are not caused by a lack of skills or knowledge at the process or organizational level, i.e., training is not required (ASTD).

HPI encompasses many things and does not always mean that training is the solution; it cannot fix the following problems, when: (1) inadequate information is available; (2) a lack of motivation exists to follow through on important initiatives and processes; (3) the wrong people being hired to do the job; (4) outdated equipment, tools, processes and resources are the only things available; (5) incentive issues exists, i.e., a culture of rewarding the wrong behaviors; (6) unclear standards from the organization and management exists; (7) confusing feedback systems and examples; (8) poor work environment and culture exists; (9) management



Figure 1 - Computer based training lab

issues exists; and finally, (10) poor processes are the order of the day.

If this is the case, one may need the help of a certified professional to help to align the business goals with any proposed initiatives, training, or infrastructure upgrades; finding the root cause of any failure is a key element in finding the appropriate solution!



**S**ome points to avoid getting a non conformity or an observation during inspection.

1. These days the authorities are very keen on checking Excel sheets recording the hours of work and hours of rest. We must take into account provisions of STCW 2010 requirements and keep these sheets updated as regularly as practicable to avoid deficiency. In practice, too, we must be mindful of giving rest to our crew to their satisfaction because the inspector may interview the crew and any dissatisfaction may attract adverse remark/penalty.
2. A transparent record of payment of wages must be kept on Master's computer with a proper backup. Allotment of wages sent and received record should be available. This is the most likely point on which crew may complain.
3. A record of requisition of provisions and their receipt should be kept to satisfy the inspector that victualling needs of the crew are adequately met.
4. Cleanliness of galley and the dress of cook and his conduct are important.
5. Domestic provision rooms (fridge rooms) should be clean with meat and fish room temperature -21DegC, vegetable room +4DegC and dry provision room +20DegC should satisfy the inspector.
6. The crew accommodation rooms must be clean and inspected monthly. The fridges in their rooms attract attention of the inspector so these should be free of cockroaches and old unfinished food/puddings.
7. Hospital room should be clean and free of undesirable items/encroachments. Best practices issued by the company should be followed. Expired medicines must not be present in medical locker.
8. Toilets must be clean and kept disinfected. Toilets in cabins that are not in daily use like pilot cabin, owner cabin, Suez canal crew cabin also to be checked.
9. Cleanliness of laundry room and drying room.
10. Accommodation Air conditioning filters must be regularly cleaned and required temperatures (heating or cooling) should be maintained.
11. Normally all good companies hold a safety cum mess committee meeting every month and MLC 2006 provisions should be discussed (in a phased manner) and recorded to provide evidence of awareness and compliance. Any complaint in regard to inadequacy of communication between the crew and his family through e-mail or phone should be enquired into by the Master. The immediate close members of the family are as important as the crew himself for his/her sound mental health and peace.
12. It is the duty of Master, chief engineer, second officer (medical officer), fitter and Bosun to be closely in touch with the crew to be able to understand their complaints, requests and meet them suitably through master or DPA (designated person ashore) in the company office.
13. Regular internal audits as per company policy and keeping their systematic record, assures the inspector about the sincerity of the command and owners.
14. You need to be pleasantly communicative with the inspector so that he feels welcome and understands that crew and command are sensitive and responsive. A cold or arrogant disposition is not liked by any one.

By **Mahendra Singh**  
Chief Engineer





# Costa Concordia Accident

## Passenger & Cruise Liner



*"Although the Passenger Ship Costa Concordia is raised from the sea bed the loss or damages it caused to the passengers remain unchanged.."*

### 1. Introduction

After the grounding of the passenger ship Costa Concordia in the Italian Coast on 13th January 2012 one of many common questions is how much compensation the passengers can claim although, suing the passenger liner is a common and loose sentence nowadays, the outcome will not match the expectation of the passengers yet considered reasonable in the eyes of law or *"not lesser than and not more than the deserved amount"*. This article intends to discuss remedies available for claims and the limitations applied under the circumstance or similar passenger ships incidents *"all that sunken treasure which is kindled the imagination"* a cruise ship of this magnitude containing its sophisticated machinery, up to date latest navigation system, casinos, restaurants, its crew, contractors, passengers and VIPs, the compensation issues can differ vastly from one to another as each category will have different type of contract govern by different set of rules however, the innocent passengers a majority deserve explanation more than others.

### 2. Useful Information About the Ship

The cruise vessel Costa Concordia, appeared to be owned by Carnival Corporation & PLC, US based company located in Miami Florida operated by Costa Cruises in Italy, she was registered in Genoa Italy, her value at the time of accident amount to about \$500 million excluding materials belonging to the contractors, passengers, VIPs and crew, therefor the real value lost could be closer to one billion dollars or more. She was carrying about 3000 passengers at the time of the accident, her route intended was Mediterranean coast appeared to be a regular route between Italy and France covering attractive islands and coast however her grounding was within Italian maritime territory near the Isola del Giglio.

### 3. Compensation what type?

For the passengers who evacuated the ship, there was loss of their personnel belongings, injuries sustained, stress and disappointment, trauma, emotional shock and even death. Adding to that the Costa Concordia did not perform its obligation to complete the journey as agreed. These could be considered as arising from direct result of the accident. The end is not simply this, as every person has its own maxims, the

distant and the remote claims cannot be ruled out; such as due to injury the passenger loses his future income, consequences due to loss of loved ones, unable to perform contractual obligations due to hospitalization and the unimaginable end. The ultimate factor in deciding the acceptable compensation is what the courts or arbitrator decide as a direct result, not too remote and within the ambit agreed. It may not be difficult, even in the vast complex structure, to decide what claims are as a direct consequence and within the contractual means most likely to reduce down to loss of personnel belongings, injures and death. Where there is non-performance of the passage by simply returning the all affected passengers the passage money.

### 4. How in General a contract between Passenger and a Cruise Liner be interpreted. If terms are unfair can they be challenged?

The contract is signed between the passenger and the Cruise Liner at the time of purchasing the ticket this, normally contains several terms and conditions. Except few the passengers do not go through all the terms or have the knowledge to interpret every term written. As a general rule the signature confirms the agreement of the contract by the passengers they, have the right to challenge the unfair contract terms even though they have already signed them, under such circumstances success in favor of passengers are less likely unless, there is serious concerns that such terms are against the law of the country i.e. Italian, USA and EU to be considered depends upon the case in which cases are held. Some of these terms are untrue statements and declarations made by the Cruise Liner's agents, contract written in unclear writing or small letters, terms excluding or limiting liability for death or injuries and other damages, other exclusion which fall against the law of the country or State where the cases are being heard. In addition to terms already in the contract the passengers can also rely on implied terms that are applied under the legislations of the country or state the courts, will assist the claimants in doing so if they find justice need to be done. Therefor although by signing a contract it is more or less certain that passengers have agreed to the terms they can still seek for some relief or can challenge certain terms in the contract they signed if they are found to be unfair to the passengers.

### 5. Time Line for Notifying of Claims and Actions by the Passengers

The time line indicated in the contract which one has signed will normally apply unless extended by an agreement by the parties. Following conditions may have expressed in the contract are worth taking into account: The notice of claim to the cruise Liner to be made within 6 months from the date of accident, those intend to file suits need to be done lesser than one year from the date of accident and service of notice to a Cruise Liner to be carried out lesser than 4 months from the time of filing the case in the relevant court. The important factor here in this some courts may extend the time requirement if they find reasonable subject to agreed terms of the contract and rules of the courts. If the passenger has excluded his or her right for such extension most likely there will be no extension of time line given.

**6. The Cruise Liners' Liability and its Right to Limit. Why did passengers may have agreed to Exclude Some Liabilities?**

A Liner is likely to seek protection for liabilities and immunities available under Athens Convention 1974 and Protocol 1976. This convention refers to Carriage of Passengers and Luggage by Sea and Loss or Damage to Personnel Property. The courts will consider the

Athens Convention and the Contract agreed with passengers when deciding liabilities. They (Cruise Liners) also have the right to limit liability therefore not every claimant will be satisfied 100%. In the case of death or injuries maximum claim may not exceed \$72000 per passenger. Objectively these amounts may consider reasonable or *"not bestowing them of the riches men or women of the world" in the eyes of the law as commonly stated by English judges.*

The right to limit liabilities can be breached in cases of gross negligence by a Liner then, limits given under the Athens Convention will not apply. In that case death or injuries claims will lead to extreme amounts consequences can be insolvency or bankruptcy. Gross negligence of the master must be imputed to the company, the master appeared to be negligent, grossly disregard his duties as the preliminary facts shows this is not anyway conclusive and will not directly lead to connect the Cruise Liner for gross negligence unless, proved master's negligence was known to a Cruise Liner and they failed to do anything about it and also taking into account all other circumstances including monitoring procedure of a Cruise Liner, the procedure followed when appointing the master, and past errors done by the same master and whether any actions were taken. We can consider one of the gross negligence case in the modern times in 1989 the "Exxon Valdez" large tanker ran aground on the Alaskan coast spilling millions of barrels of crude oil in the sea polluting the US coast and damaging the marine environment the masters an alcoholic may have known to the company but was allowed to command.

The waiver or agreed exclusion of certain rights by the passengers, as customary only a few may read all what exactly contain in a contract, the contract also contain terms stating that the passenger has agreed to waiver or exclude certain claims one good example is rights to sue the company on

emotional damages, stress and disappointment, trauma ETC that may arise from an accident on board. Others may include waiver on jurisdiction in any other country except what is stated in the contract in the Costa Concordia probably Genoa Italy, time lines to bring charges against the Cruise Liner in line with existing court rules and, right to bring class action or taking a group action. The Cruise Liners position seems to be that it will obtain the right to limit unless serious negligence issues arise during the investigation process. The passengers by agreeing to exceptions in the contract have placed a Cruise Liner in a better position.

**7. The Summary of Claims may be Awarded to Passengers**

After considering number of factors following approximation could be drawn. As all the passengers may not have one unique type of contract variations can be expected.

Type of Passenger Claims	Possible Awards
Breach of contract Voyage not performed	Return of passage money
Injuries or illness	Up to \$ 72000
Death	\$ 72000 per passenger
Emotional damages	Excluded
Stress	Excluded
Baggage loss or damage (where the value of personnel belonging not declared)	500 per passenger \$ 150 per piece whichever lower
Baggage loss or damage (where the value of personnel belonging been declared & additional tariff paid )	True Value as declared Maximum up to \$5000*

\*1974 Athens Convention & 1976 Protocol's limits are lower \$1250 only.

Note: Values in the Athens Convention given in Currency terms known as Special Drawing Rights (SDR) current equivalent is 1 SDR = US\$ 1.53

**By** **Capt. Francis Lansakara FNI**  
 Director – JMC Nautical Pte Ltd. Singapore  
 Master Mariner. LLM (London) specialist in shipping law



## Time to Change

In more and more regions of the world, ships have to change to low-sulphur fuel before being allowed to sail into Emission Control Areas. But how does one make this switch with a gigantic ship? The procedure is more complicated than you might expect.

Viscosities, temperatures, consumption – these are terms that fill any chief engineer with joy. And it's just as well for these figures are crucial when it comes to the so-called fuel changeover that is required when ships enter or leave Emission Control Areas (ECA), for example, in North America and North Europe. "The regulations in force there since January 1, 2015 state that the maximum sulphur content in fuel is 0.1 percent. Beyond the ECA, the limit is 3.5 percent," says Chief Engineer Karsten Bartlau in the ship's office of the "Kuala Lumpur Express."

More and more of the world's maritime areas are introducing stringent caps on the sulphur content in fuels. This is why the container ships of Hapag-Lloyd are increasingly using low sulphur Marine Diesel Oil, MDO for short. This is not only considerably more expensive but also involves a complex procedure: before the vessel enters an Emission Control Area, the fuel system has to be switched completely. But what precisely does that entail? An on-board technology report.



For Chief Bartlau the preparations for the switch begin 24 hours before the ECA border.

Four times per tour is how often the "Kuala Lumpur Express" needs to switch fuels. The 8,750-TEU vessel operates on the AX1 service between Northern Europe and the US East Coast – and thus between the ECAs in North America and those in the North and the Baltic Sea. When entering the English Channel, for example, the regulations state that once ships pass "5 West", the longitude of five degrees west of Greenwich, only fuel with a sulphur content of less than 0.1 percent is allowed to pass through their fuel-injection nozzles. Failing that, there is the risk of a six to seven-digit figure penalty on both sides of the Atlantic, delays to the schedule, not to mention the ship could be prohibited from entering ports. In the United States, a ship's officers can even be arrested if violations can be proven.

As a result, preparations for the fuel switch are very thorough. The process starts around 24 hours before the ship reaches the ECA border with a message from the nautical officers. "The nautical officers tell us when we will be reaching the border. And from that point in time we calculate backwards," explains Chief Bartlau. Together with the third engineer, he immediately starts making preparations. To begin with, they slowly reduce the temperature in the HFO service tank to 120 degrees Celsius and raise the temperature in the MDO service tank to 45 degrees Celsius. This ensures that the temperature difference between the two fuels is only around 75 degrees. This provides a significant advantage. "The difference in temperature between fuel that has just been used and new fuel is one of the most important determinants," says Bartlau. The change of temperature gradient in the main engine should never be more than two degrees Celsius per minute at the most, as sudden changes can lead to leakage and in the worst case to a piston seizing.



The chief also uses a fuel changeover calculator to gauge the exact duration for the conversion – the software was specifically customized to each individual ship in the fleet. In the example shown, the switch-over period for the "Kuala Lumpur Express" lasted exactly three hours and 41 minutes. As this is a relatively new vessel, the changeover on this ship is very fast. On other ships that are older, the entire process can take anything up to 72 hours.

"We pass this data on the nautical officers. They need to know that as of 61.1 nautical miles to the west of "5 West" – with the addition of a safety zone of 10 to 15 minutes – we need to be traveling at a speed of 16.6 knots to ensure that we definitely use up the sulphurous fuel within the calculated time." To give the Chief and the third engineer enough time to prepare for the changeover, they need to be notified five hours before they reach the zone.

Around 4:20 hours before reaching the edge of the zone, the engineers begin with the changeover. The supply of hot steam – the heating for the HFO pipes and aggregates – is cut off. They also open the MDO valve a little and shut the HFO valve by the same margin. This process is repeated several times over the next 40 minutes as the 3:41 hours calculated for the fuel changeover apply to fully opened MDO and fully closed HFO valves.

As soon as the valve is open, MDO flows through the supply pump and the automatic filter, the circulation pump and the indicator filter. It mixes with the HFO flowing back that has not been burnt and gradually replaces it. At the same time, the temperature of the fuel drops. "We successively actuate each of the spare supply and circulation pumps as well as all chambers in both filters. Only then can we be sure that all residual HFO has been burnt," says Bartlau.

Nothing could be worse than a changeover process that was executed in good time after which a port state control officer just happened to take a test sample from a pump that was not in operation. "The cards would definitely be stacked against us if we were forced to say: please don't take a sample from here!" Over the past few months, Bartlau has already witnessed one such inspection when a sample was taken and analyzed. The result of the test was negative: the sulphur content was within the limit.

Wolfram Guntermann, Director Environmental Fleet, says: "We support regular and rigorous inspections in all Emission Control Areas. That is the only way we will really see a positive impact on the environment." Shipping companies who consistently abide by the laws and regulations fear that there is far less willingness to take action if there are no inspections. After all, there is a lot of money at stake – low sulphur MDO costs almost exactly twice as much as HFO. That is why Hapag-Lloyd has joined the Trident Alliance. This initiative is a coalition of shipping owners who are working towards bringing about a robust and transparent enforcement of maritime sulphur regulations. Guntermann says: "At the same time it is also about creating a level playing field and ensuring fair competition."

When entering Emission Control Areas, the challenge lies in completing the fuel changeover just a few minutes before crossing the border. If the chief engineer begins the changeover process prematurely, then he is literally burning money. Just one hour too long is tantamount to a four-digit dollar amount. When leaving the zone, the primary goal is to avoid damaging the engine's components through the changeover from cold MDO to hot HFO. That is why the "two degrees per minute" rule also applies in this case.

Chief Bartlau says: "On our first few trips the changeover was quite an exciting process. No one knew how the main engine and the aggregates would respond. But now with our vast know-how, we've established a very conscientious routine here on board."

Photos: Sebastian Vollmert Reproduced from Hapag Lloyd's Insight January 2016



## Global Maritime Education & Training Association

### GlobalMET Limited

Australian Company Number 103 233 754

[www.globalmet.org](http://www.globalmet.org)

Chair:  
New Zealand Maritime School  
2 Commerce Street  
Private Bag 92068  
Auckland  
New Zealand

Executive Secretary:  
Rod Short  
P O Box 307 Waikanae  
Kapiti Coast 5250  
New Zealand  
[rod.short3@gmail.com](mailto:rod.short3@gmail.com)

### Secretariat

P O Box 307 Waikanae  
Kapiti Coast 5250 New Zealand  
Tel 64 4 905 6198  
[rod.short3@gmail.com](mailto:rod.short3@gmail.com)

1070 Tower B1 Spaze I-Tech Prak  
Sector 49 Gurgaon 122002 India  
Tel 91 124 45525 56/57  
[secretariat@globalmet.org](mailto:secretariat@globalmet.org)