



International Cruise Victims Association, Inc.

National Transportation Safety Board

Forum On

Cruise Ships: Examining Safety, Operations and Oversight

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**ICV Comments and Recommendations on Cruise Ship Safety,
Operations and Oversight**

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Part One

U.S. Regulation of Foreign Flagged Cruise Vessels

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UNITED STATES REGULATION OF FOREIGN FLAGGED CRUISE VESSELS

Agencies of the United States do have some regulatory authority over foreign flagged cruise vessels in United States waters, but with limited remedies.

Neither United States nor foreign flagged vessels may depart from a United States port without clearance from the United States Secretary of Homeland Security (acting through the United States Coast Guard, now a division of the Department of Homeland Security). Specifically, even a foreign flagged vessel, which includes most cruise vessels operating from United States ports, must obtain clearance to leave a United States port for another United States port, a foreign destination, or another vessel outside of United States territorial waters. 46 U.S.C. §60105(b). The Coast Guard is to deny clearance and prevent departure of any foreign vessel embarking passengers from a United States port, or carrying a United States citizen as a passenger, if the vessel does not comply with any of the applicable standards of the International Convention for the Safety of Life at Sea (SOLAS) to which the United States is a party. 46 U.S.C. §3505. *See also* 46 U.S.C. §70121(a)-(b)(withholding departure clearance or alternatively requiring a bond before clearance for vessels violating port security statutes or regulations). Almost any cruise vessel docked at a United States port will either be embarking passengers from the port, carrying United States citizen passengers, or most likely both, and hence will be subject to Section 3505. In addition to the remedy of denial of departure clearance, cruise vessels may be subject to denial of entry to a United States port for certain violations. *See, e.g.,* 46 U.S.C. §3507(h)(2)(potential denial of entry to vessels noncompliant with the Cruise Vessel Security and Safety Act of 2010).

The Coast Guard may assess civil penalties for violations of statutes or regulations governing the operation of cruise vessels. *See, e.g.* 46 U.S.C. §70120(a) (civil penalties to be assessed in rem against any vessel operated in violation of statutes or regulations pertaining to port security); 46 U.S.C. §3507(h)(1)(a)(civil penalty of \$25,000-\$50,000 for any "person" violating the CVSSA or any CVSSA implementing regulation); 46 U.S.C. §70119(a)(civil penalty of \$25,000 -\$50,000 for persons violating United States port security statutes or regulations). The Coast Guard imposes these civil penalties through an administrative process consisting of a notice of violation issued by the Coast Guard, with an opportunity for an administrative hearing to contest the assessment. *See* 33 C.F.R. §§1.07-1-1.07-100 (civil penalty procedures); 33 C.F.R. §§20.101-20.1315 (administrative procedures for hearings concerning civil penalties in front of an administrative law judge).

Thirdly, in the case of willful violations of certain statutes or regulations, criminal penalties may apply. *See, e.g.*, 46 U.S.C. §3507(h)(1)(B)(potential criminal penalty of up to a \$250,000.00 fine or one year in prison for person "willfully" violating the CVSSA or CVSSA regulations); 33 C.F.R. §§1.07-90, 1.07-95 (referral by Coast Guard to the Department of Justice for criminal prosecutions). The United States may also prosecute crimes committed by foreign vessel crewmembers (including cruise ship crewmembers) who violate Title 18 of the United States Code, if the vessel has "a schedule departure from or arrival in the United States," if either the perpetrator or the victim is a United States national. 18 U.S.C. §7(8).

Note that, from the perspective of a major cruise line such as Carnival or Royal Caribbean, civil penalties of the type imposed for violations of port security regulations

or the CVSSA, in the range of tens of thousands of dollars at most, may fairly be characterized as trivial. Even a criminal fine of \$250,000 would be insignificant to a major cruise operator. In theory, criminal penalties against an individual officer of the company might be imposed, which might be sufficient to gain the attention of corporate officials. Given the need to prove willfulness or criminal intent on the part of an individual officer, the actual risk to a cruise line of a successful criminal prosecution of an officer is minimal. Port debarment or denial of departure clearance is a theoretical possibility for certain violations, but at most is a nuisance requiring the possible posting of a bond or hiring of a contractor to make repairs. A major deficiency is the lack of a civil damage remedy for violations of SOLAS or Coast Guard regulations; civil liability against cruise lines subject to United States jurisdiction is imposed under a generic "reasonable care" standard; violation of a statute or regulation may or may not constitute a violation of this reasonable care standard, and so does not automatically generate civil liability.

A theoretical alternative to Coast Guard or port state regulation of cruise vessels is regulation by their flag states, including such commonly chosen flag states as Panama, Liberia, or the Bahamas. Vessels are considered for jurisdictional purposes territorial extensions of their flag states, just as embassies are considered extensions of their states' territories. Thus a flag state will technically have jurisdiction to regulate safety violations or breaches of law by a vessel operating under its flag. *See Lauritzen v Larsen*, 345 U.S. 571, 585 (1953)(a vessel is deemed part of the territory of the sovereignty whose flag it flies); *United States v. Arra*, 630 F.2d 836, 840 (1st Cir. 1980); *United States v. Marino-*

Garcia, 679 F.2d 1373, 1380 (11th Cir. 1982)(vessels are “normally considered within the exclusive jurisdiction of the country whose flag they fly”).

This theoretical flag state regulatory jurisdiction proves illusory in practice, however. First, vessels only incidentally and occasionally visit ports in their flag states. When the vessel is rarely or never in a flag state port, the flag state will not have an opportunity to conduct an inspection and take even the steps the Coast Guard might take upon locating a non-compliant vessel in a United States port. Without an inspection, the flag state will not detect any regulatory violations and will have no opportunity to restrict entry to or departure from port, let alone impose a civil or criminal penalty. Even when vessels do occasionally visit their flag states, there in practice is only limited inspection and enforcement, due to limited resources and a lack of incentive to place any restrictions on industries flagging their vessels in a host state.

Part Two

Section 1

Overview of Cruise Ship Safety and Security (Including Fires, Collisions and Other Incidents)

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SAFETY AND SECURITY OF CRUISE SHIPS

Written by

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As the luxury liner finally made it to shore ... [passengers] expressed disgust at the way they had been treated ... Conditions inside the cabins were said to have been "beyond horrific" due to the lack of air conditioning and running water. Lavatories overflowed and they were fed on little but spam sandwiches. They were forced to sleep on deck in sweltering temperatures of up to 35C (95F) and said that the stench in the corridors and cabins was so bad it would remain with them "for a long time"... "Sheer luck has disguised the incompetence from start to finish. Some people are blissfully unaware of how lucky they are."

The alarm was first raised at around 1.30pm on Monday when an electrical fault caused a fire in the engine room and power was lost ... All passengers were told to go to their muster stations, at which point many said they feared they would have to abandon ship ... It then took three hours to conduct a roll call amid chaotic scenes and growing panic. As black smoke billowed from one of the chimneys, it became immediately clear that a fire had broken out on board.

American Gordon Bradwell, 72, from Georgia, who used to work in the travel industry, was on the cruise ship with his wife Eleanor when the engine caught fire. "It was very tense," he said. "We are just happy to have got through it. We were very hot and the sewage was very poor. Right now we're delighted to be off the ship. We are living off adrenalin right now. We have been eating dried sandwiches for three days so we are looking forward to eating a proper meal. After the fire broke out there was nothing to propel the ship along. Things deteriorated rather quickly. There was no running water so we had go back to living a primitive existence. The cabin temperature reached 110F so we had to sleep on the deck."¹

¹ Ward, V. 2012. "Costa Allegra: Passengers Tell of 'Hell' On-board. The Telegraph (March 1)

One might think this describes the ordeal on *Carnival Triumph* in February 2013, but it is about an almost identical incident occurring a year earlier in February 2012. The *Costa Allegra* experienced an engine fire, causing a loss of all power and setting it adrift for three days in the Indian Ocean. It was finally towed to Port Victoria on the island of Mahe in the Seychelles where passengers disembarked. The ship was decommissioned and scrapped after the incident.

A. The Nature of the Problem

The cruise industry would like us to believe incidents such as the one described above, and the eerily similar incident involving *Carnival Triumph* which had an engine fire knocking out all power and setting the ship adrift for five days² – finally arriving in Mobile under tow – are uncommon. The question isn't whether they are uncommon, but how common they are. Take for example the following engine fires, all involving members of the Cruise Lines International Association:³

- June 2009 – *Royal Princess* had an engine room fire while leaving Port Said, Egypt. The ship returned to the port the next day and after evaluation of damage the cruise was terminated.
- November 2010 – *Carnival Splendor* has engine room fire setting it adrift; the ship was finally towed to San Diego (150 miles north) even though it was 55 miles west of Punta San Jacinto, Mexico. It was a five day ordeal for passengers. Initially there was no electricity and toilets did not work, but toilets were restored by the end of the first day although there was no air conditioning and no hot food service. The ship's engine that failed had had five alarms between July 21, 2010 and November 5, 2010, most recently repaired on November 5, 2010; the fire occurred on November 8, 2010.⁴
- September 2011 – Hurtigruten's *Nordlys* suffered an engine room fire, killing two crew members and injuring 16. The ship was evacuated by lifeboat and the cruise was terminated. The *Washington Post* reported salvage teams pumped water from the cruise liner in danger of capsizing, reducing the tilt 21.7 degrees in the morning to 16 degrees in the evening.
- October 2011 – Cunard Line's *Queen Mary 2* suffered an engine fire causing a loss of power while in a major storm (two other ships chose to turn back from the storm, but the *Queen Mary* decided to battle through). Staff members were given a 90 minute warning in order to prepare to deploy the lifeboats. Guests had their children dropped off and their animals picked up from the kennels. Power was restored, but people were understandably shaken up. Three weeks later the ship twice went dead in the water on a transAtlantic cruise. And again in February 2012 the ship had a total power failure and was dead in the water.

² See Brown, R., K. Severson, and B. Meier. 2013. "Cruise Line's Woes are Far From Over as Ship Makes Port," *New York Times*, (February 15).

³ All of these events are reported at Events at Sea (www.cruisejunkie.com/events.html)

⁴ See United States Coast Guard. 2013. *Report of Investigation into the Fire Onboard the Carnival Splendor which Occurred in the Pacific Ocean Off the Coast of Mexico on November 8, 2010, which Resulted in Complete Loss of Power*, MISLE Incident Investigation Activity Number: 3897765 (July 15).

- March 2012 – *Azamara Quest* had an engine room fire, injuring five crew members (one critically), setting the ship adrift between Manila and Borneo. The ship was able to restore power and some propulsion after 24 hours and limped to Sandakan, Malaysia, arriving three days after the fire. The cruise was terminated and passengers flown home.
- April 2012 – *Adventure of the Seas* had an engine room fire causing section 6 of the ship to be temporarily evacuated. The ship was adrift for 1-2 hours and then continued on one engine.
- November 2012 – *Adventure of the Seas* had an engine room fire while crossing the Atlantic causing a brief loss of power and electricity.
- February 2013 – *Carnival Triumph* suffers an engine room fire, setting it adrift for five days without power, air conditioning, or toilets. Initial plans were to tow the ship to the closest port, Progreso, Mexico, however a decision was subsequently made to tow the ship to Mobile. NOTE: The ship was reported to have technical problems with its propulsion system affecting its cruising speed and causing a six hour delay in its return to port two weeks before;
- June 2013 – Pullmantur's *Zenith* had a disabling engine fire and had to be towed to port (Venice, Italy)

There are also ships running aground (19 since 2009) with some incidents leading to termination of the cruise. Some examples include:

- January 2009 – Hurtigruten's *Richard With* ran aground at the port of Trondheim on the west coast of Norway suffering propeller damage and taking on water through a leak in a seal. All 153 passengers were evacuated by the local emergency services from land.
- February 2009 – Quark Expeditions' *Ocean Nova* ran aground off Antarctica. Passengers were evacuated to other ships. Unofficial sources report the ship's engines were turned off for maintenance when the ship was blown aground.
- August 2010 – *Clipper Adventurer* ran aground in Canada's Northwest Passage. Passengers were transported to Coppermine, Nunavut to be transported home.
- October 2010 – Celebrity Cruises' *Century* damaged its rudder at Villefranche-sur-Mer. Cruise terminated.
- March 2013 – Hurtigruten's *Kong Harald* was forced to wait for the tide to come in and lift the ship off the underground rock at the entrance to Trollfjord where it was grounded and the hull breached. Once the incoming tide freed the ship it carried on to Svolvær, where all 258 passengers onboard disembarked and were flown home today.
- March 2013 – Coastal and Maritime Voyages' *Marco Polo* ran aground just outside Sortland in Vesterålen causing a leak in a ballast tank.
- March 2013 – Lindblad Expeditions' *National Geographic Sea Lion* hit a rock in the Las Perlas Islands, about 70 nautical miles from Panama City. The ship sustained damage to its hull and one propeller during the incident, but after clearance from the U.S. Coast Guard returned to Panama City on its own power. The cruise was terminated.

It isn't just engine fires and ships running aground. There are other problems worth note:

- March 2009 – P&O Cruises' *Aurora* experienced propulsion problems four hours after leaving Sydney. It limped to Auckland where passengers remained onboard for five days while repairs were completed. The world cruise itinerary was changed.
- April 2009 – Passengers were told upon embarkation on *Seven Seas Voyager* that most port calls between Dubai and Rome were canceled because of propulsion problems; the next two cruises canceled.
- November 2009 – *Norwegian Dawn* lost power for hours (and no air conditioning). Power was restored and the ship sailed to San Juan from where passengers were flown home. This and the next cruise were canceled.
- February 2010 – *Costa Europa* collided with pier in Sharm-el-Sheikh, ripping a hole in the side of the ship and flooding crew cabins. Three crewmembers were killed; four passengers were injured. The 18-day cruise from Dubai to Savona was terminated and passengers flown home.
- February 2010 – P&O Australia's *Pacific Dawn* was delayed in port for 18 hours because of propulsion and maintenance problems; its itinerary is changed. Two months later the ship lost power and propulsion and narrowly missed collision with a bridge in Brisbane.
- May 2010 – P&O Cruises' *Artemis* notified passengers upon boarding that engine problems require one port to be dropped from the itinerary. But once underway on the 20 day cruise, originally with ten scheduled port calls, passengers were issued a revised itinerary with four ports calls, only three of which were on the original itinerary.
- June 2010 – Celebrity Cruises' *Infinity* was delayed five or six hours because of engine problems causing a port call to be canceled. Five days later an electrical fire caused a power loss for several hours.
- February 2011 – P&O Australia's *Pacific Sun* delayed 24 hours in its arrival at Newcastle because of engine problems; several port calls canceled. Propulsion problems in November 2010 caused a 10-hour delayed arrival in Melbourne, engine problems cause a cruise to be canceled in April 2010, mechanical problems caused two ports calls to be canceled, and in November 2009 a cruise was canceled to permit repair of the propulsion system.
- March 2011 – MSC's *Opera* twice collided with pier at Buenos Aires damaging several cabins and delaying departure for 10 hours while repairs completed. September 2011 – Toilets in front and mid-ship cabins were inoperable for a day on *Carnival Imagination*. Passengers were told to use public washrooms in the aft section.
- May 2011 – MSC's *Opera* had failure of an electric panel causing power loss for 8.5 hours. The ship was towed to port and the cruise canceled.
- November 2011 – *Carnival Splendor* collided with pier in Puerto Vallarta, requiring it to stay an extra day to complete repairs; the next port call was canceled.
- January 2012 – *Costa Concordia* hits a rock off the Italian coast and capsizes killing 32 people.
- February 2012 – *Enchantment of the Seas* left Baltimore 24 hours late after unsuccessful attempts to repair an engine. The ship started the cruise on one engine, sailing at half speed, and the itinerary changed. Two weeks later the cruise had propulsion problems that left it in Port Canaveral for 27 hours for repairs, again requiring a change to the itinerary.
- March 2012 – Silversea Cruises' *Silver Shadow* collided with container ship in Viet Nam holing the cargo ship; only minor damage to the cruise ship. Passengers were frightened.

- October 2012 – Celebrity Cruises' *Summit* had a tender run aground with 93 passengers and 2 crew members. The tender suffered major damage and passengers were rescued by a fishing boat and whale-watching boat.
- November 2012 – *Saga Ruby* had engine problems that required the current cruise to be canceled.
- March 2013 – A malfunction of the backup emergency power diesel generator caused power outages and plumbing issues on *Carnival Dream* and led to a cruise being terminated in Saint Maarten and passengers flown home.
- March 2013 – Steering problems required *Carnival Elation* to have a tugboat escort to port.
- March 2013 – *Carnival Legend* was disabled and stuck in Costa Maya for a day. It finally got underway at reduced speed and dropped a port call to arrive on time at its port of disembarkation. The itinerary of the subsequent cruise was changed because of propulsion problems.
- March 2013 – *Seven Seas Voyager* suffered propulsion problems causing ports to be skipped.
- April 2013 – *Crown Princess* began a cruise with 410 cabins having toilets that would not flush. Until they were fixed, passengers needed to go to public bathrooms (even during the middle of the night).

The list can go on. Appendix 2 lists cruise ships having two or more incidents between January 2009 and June 2013. It shows 353 incidents involving mechanical problems and accidents, approximately 80 incidents per year.

The obvious question is how such events can be so common. A February 2013 in *Newsweek* gives the perspective of Jim Hall, head of the National Transportation Safety Board during the Clinton administration:

[He] says the industry is watched over by "paper tigers" like the International Maritime Organization and suffers from "bad actors" ... "The maritime industry is the oldest transportation industry around. We're talking centuries. It's a culture that has never been broken as the aviation industry was, and you see evidence of that culture in the [Costa Concordia] accident," says Hall.

Ships may seem and feel American but are mostly "flagged" in countries like the Bahamas or Panama in order to operate outside of what he says are reasonable safety standards. "It is, and has been, an outlaw industry," says Hall. "People who book cruises should be aware of that."⁵

B. Lessons to be Learned from These Events

My point is not to muckrake, listing all that goes wrong with cruise ships. My analysis instead provides insights. By knowing the problems, we can identify potential solutions. The available data raises several issues.

⁵ Conant, E. 2013. "Carnival from Hell: The Warning Signs Before the Triumph Disaster," *Newsweek* (February 22).

Part Two

Section 2

Ships with Two or More Mechanical Incidents January 2009 – June 2013

**Prepared by:
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Ships with Two or More Mechanical Incidents, January 2009 – June 2013

A. CARNIVAL CORPORATION (7 companies, 45 ships, 145 incidents)

Carnival Cruise Lines (19 ships, 74 incidents)

Carnival Destiny (n=6)

11/18/2009	Primary motor unit 1 tripped due to malfunction
1/26/2010	Propulsion problems; itinerary changed, cruises canceled
10/22/2010	Propulsion problems; primary motor two faulty
9/10/2011	Lifeboat damaged -- removed for repair
1/7/2012	Material failure
1/24/2013	Problem with stern thrusters; itinerary changed

Carnival Dream (n=3)

7/6/2011	Propulsion problems; change from Western Caribbean to Eastern Caribbean itinerary
10/7/2012	Fire
3/14/2013	Malfunction of backup emergency diesel generator, power outages and plumbing issues; cruise canceled in St. Maarten

Ecstasy (n=5)

1/19/2009	Propulsion problems; operating on half power
2/13/2009	Fire
1/28/2010	Collision with gangway
4/22/2010	Severe list to avoid buoy; damage and 60 injuries
4/18/2013	Power failure; some onboard attribute it to a fire

Elation (n=3)

10/20/2009	Propulsion problems as a result of failure with electronic control system
1/13/2011	Technical problem with propulsion system; port call skipped
3/14/2013	Steering problems; tugboat escort required

Fantasy (n=4)

1/29/2009	Equipment failure in steering system
1/5/2010	Lifeboat failure/material failure
7/27/2011	Collision with <i>Imagination</i> ; minor damage
10/17/2011	Vessel maneuverability problem; arrives in port late

Fascination (n=3)

7/1/2010	Loss of power for several hours, adrift; late arrival
2/27/2011	Material failure
1/19/2013	Late return from dry dock; 7 hour delay

Carnival Freedom (n=3)

2/6/2010	Fire in crew cabin
6/27/2011	Blackout due to generator failure; fuel oil filters cleaned, fuel oil purifiers started and chemical treatment added to the both service tanks.
8/21/2011	Material failure

Carnival Glory (n=3)

5/15/2011 Vessel maneuverability
11/14/2012 Material failure
12/2/2012 Propulsion problems

Holiday (transferred to Iberocruises in 2010) (n=4)

1/20/2009 Material failure
2/6/2009 Technical problem causing reduced speeds; dropped port call on this and next cruise

3/9/2009 Material failure
4/11/2009 Material failure

Imagination (n=3)

7/13/2010 Fire in the elevator machinery room leaving two passenger elevators and one crew elevator inoperable
7/27/2011 Collision with Fantasy
9/28/2011 Toilets in front and midship inoperable for day

Carnival Legend (n=10)

3/21/2009 Smoke and fire system on Deck B-A-1 in fault and not operating properly
6/21/2009 Unpalatable water in cabins
9/30/2009 Collision with *Enchantment of the Seas*; minor damage
2/7/2010 Maneuverability problems given malfunctioning azipod
2/14/2010 Mechanical problems cause seven-hour delay leaving Tampa, itinerary changed; vessel pitched when leaving Roatan, maybe caused by touching channel wall
7/11/2010 Loss of propulsion on port azipod while entering port; faulty circuit breaker tripped
1/17/2012 Material failure
1/29/2012 Technical problem with starboard azipod causes late arrival (5 hours) and delayed embarkation (2 hours)
3/14/2013 Disabled and stuck in Costa Maya; a day later underway with reduced speed and changed itinerary
3/16/2013 Propulsion problems; changed itinerary

Carnival Liberty (n=4)

4/26/2010 Problems with palatable water in cabin
11/5/2010 Two diesel generators shutdown because of malfunction
1/15/2012 Technical problem, severe list
11/25/2012 Loss of electrical power

Carnival Miracle (n=3)

1/10/2010 Lifeboat material failure
1/28/2010 Collision with pier at Port Zante (St. Kitts); stay overnight for repairs and arrive late for disembarkation
1/18/2011 Lifeboat material failure

Carnival Paradise (n=2)

8/31/2012 Material failure
10/1/2012 Partial loss of propulsion; power loss

Carnival Pride (n=2)

5/16/2009 Fire in battery room
3/31/2011 Blown from mooring at Port Canaveral; delayed departure

Sensation (n=2)

2/9/2012 Burst pipe floods 10 – 20 cabins; departure delayed 4 – 5 hours
5/22/2012 Fire

Carnival Splendor (n=7)

11/8/2009 Delay in Long Beach (7 hours) to repair fire door
11/25/2009 Collision with *Radiance of the Seas* in Puerto Vallarta
12.17/2009 Collision with pier in Puerto Vallarta, stayed until 3:30PM next day for repairs; next port call canceled
2/18/2010 Sharp turn (radar missed some small yachts in path) causes flooding onboard
11/8/2010 Fire lasting several hours knocks out all power, ship towed back to San Diego; this and next 8 – 10 cruise canceled
1/6/2013 Itinerary changed to permit two days in Puerto Vallarta for repair of damage to propulsion system
1/13/2013 Cruise delayed one day given repair of propulsion system; itinerary changed

Carnival Triumph (n=4)

3/14/2010 Vessel maneuverability
11/18/2010 Oil leak from shaft seal of forward bow thruster; disabled until repairs made
1/27/2013 Technical problem with propulsion system affecting cruising speed; 6 hour delay in return to port
2/10/2013 Disabling fire, adrift for days with no power/electricity, towed to port; cruise canceled

Carnival Victory (n=2)

1/17/2010 Failure of UPS battery charger
1/20/2013 Propulsion problem; leaves port almost 24 hours late, itinerary change

Costa Cruises (1 ship, 2 incidents)

Costa Europa (n=2)

3/5/2009 Propulsion problems lead to passenger revolt; ports missed
2/26/2010 Collision with pier in Sharm-el-Sheikh killing three crew and injuring four passengers; cruise canceled

Cunard Line (1 ship, 6 incidents)

Queen Mary 2 (n=6)

7/22/2009 Broke from mooring lines; damage to stern, four hour delayed departure
9/23/2010 Loss of electric and all power for an hour after explosion in electric panel
10/5/2011 Fire causes power loss in major storm, damage onboard; arrive in NYC 2 hours late
10/17/2011 Went “dead in the water” twice during transatlantic cruise
2/4/2012 Total power failure, “dead in the water”
10/23/2012 Material failure

Holland America Line (7 ships, 21 incidents)

Maasdam (n=4)

3/17/2009 Fire in crew galley
5/22/2009 Severe list caused by pilot error
8/8/2012 Sewage and refuse from ship washes up on shore at Nahant, MA

6/13/2013 Port forward propulsion system malfunctioning; 2.5 hour delayed departure and sailing at reduced speed

Prinsendam (n=2)

9/11/2010 Major damage from storm – 50 windows blown out (with flooding) and dent in prow of ship

12/17/2010 Lifeboat failure

Ryndam (n=2)

11/18/2012 Material failure

6/8/2013 Fire – 40 minute wait for all clear after initial alarm

Statendam (n=2)

12/21/2009 Engine problems, changed itinerary

9/22/2012 Fuel pump explosion causes two hour power outage

Westerdam (n=2)

5/11/2011 Collision with ice; damage 15 feet below water line

10/28/2011 Fire

Zaandam (n=6)

1/13/2009 Alternator of #5 generator exploded causing switchboard to ground out; emergency generator started 43 second later

7/13/2010 Fire

7/28/2010 Loss of electrical power

8/11/2010 Material failure

6/7/2011 Material failure

10/19/2012 Mechanical problems and/or flooding onboard

Zuiderdam (n=3)

7/8/2010 Material failure

2/9/2012 Fire in engine room

9/25/2012 Material failure

P&O Cruises (4 ships, 12 incidents)

Artemis (n=2)

4/7/2010 Engine problems, skipped St. Barts

5/8/2010 Engine problems, itinerary changed from 10 ports to 4 ports (Pax advised when boarding that there were engine problems and 1 port would be skipped)

Aurora (n=4)

3/3/2009 Propulsion problems – Broke down 4 hours after leaving Sydney. Stuck in Auckland (with passengers aboard) for five days for repairs. Itinerary changed

9/18/2009 Mechanical problems and loss of bow thruster; changed itinerary

9/30/2011 Electrical problems delay for three hours departure from Portland, ME

2/8/2013 Fault with port propeller shaft. Delayed in Auckland, dropped two port calls

Oriana (n=4)

8/5/2010 Delayed four hours in Dubrovnik; computers crash causing loss of steering system

8/7/2010 Fire on tender

11/30/2010 Engine breakdowns; missed port call

6/2/2011 Collision with pier

Ventura (n=2)

10/18/2012 60 mm crack on full width of deck 14; passengers advised to not use balconies
3/17/2013 Propulsion problems cause missed ports and itinerary changes

P&O Australia (3 ships, 10 incidents)

Pacific Dawn (n=3)

1/8/2009 Engine problems; arrival in Sydney 10 hours late
2/15/2010 Propulsion and maintenance problems cause 18 hour delayed departure; itinerary changed
4/10/2010 Loss of power and propulsion; near miss collision with bridge

Pacific Pearl (n=2)

2/2/2011 Three-meter-across chandelier falls three storeys into café area in atrium
2/3/2011 Lack of running water and working toilets

Pacific Sun (Left fleet in 2012) (n=5)

11/10/2009 Cruise canceled to permit repair of propulsion system
3/13/2010 Mechanical problems cause canceled port calls at Suva and Denarau
4/21/2010 Engine problems; cruise canceled
11/2/2010 Propulsion problem; 10 hour delayed arrival at Melbourne
2/28/2011 Engine problems, 24 hour delayed arrival at Newcastle; several ports canceled

Princess Cruises (10 ships, 34 incidents)

Caribbean Princess (n=9)

10/16/2009 Severe list, storm damage
4/5/2010 Severe list, steering malfunction
5/9/2010 Collision with gangway; departure delayed several hours
8/8/2010 Material failure
2/4/2012 Engine problems - delays
2/25/2012 Material failure
3/12/2012 Engine problems – next two cruises canceled
6/8/2012 Technical fault; remain in port overnight, itinerary changed
12/15/2012 Loss of electrical power

Coral Princess (n=3)

3/19/2009 Propulsion problems; missed port
8/19/2011 Turbine oil system failure; switch to diesel electric power
5/2/2013 Fire

Crown Princess (n=3)

6/20/2009 Fire in passenger cabin
7/17/2012 Electrical fire in passenger cabin
4/13/2013 Toilets in 410 cabins not operational

Dawn Princess (n=3)

6/15/2010 Propulsion breakdown, adrift for 2.25 hours; restored and sailing at reduced speed
7/16/2010 Engine problems; missed port call
10/27/2011 Mechanical problem; missed port call

Emerald Princess (n=2)

7/26/2010 Electrical failure leads to propulsion problems; no A/C; repaired in 6 hours
5/17/2011 Collision with fuel barge damages several lifeboats

Golden Princess (n=3)

1/22/2009 Near-collision with fishing vessel
3/22/2009 Fire in engine room
3/28/2012 Vessel maneuverability

Royal Princess (n=2)

6/18/2009 Fire in engine room as leaving Port Said, passengers called to muster stations; cruise and next cruise canceled
4/9/2010 Break in fire hose fitting causes extensive damage to restaurants; water leaked all the way down to crew decks

Sapphire Princess (n=4)

7/12/2010 Severe list to avoid collision with whale
2/4/2011 Loss of electrical power
2/26/2011 Material failure
9/7/2011 2 pleasure boats swamped and float dock damaged by ship's wake when maneuvering in Ketchikan Harbour

Star Princess (n=3)

3/21/2011 Material failure
7/1/2012 Material failure
8/2/2012 Material failure

Sun Princess (n=2)

7/25/2012 Material failure
8/27/2012 Transformer blown leading to loss of power adrift for 3.5 hours

B. ROYAL CARIBBEAN CRUISES LIMITED

Celebrity Cruises (4 ships, 13 incidents)

Century (n=4)

10/15/2010 Rudder damaged, stranded in Villefranche-sur-Mer; cruise canceled
10/22/2011 Vessel maneuverability problems
3/25/2012 Engine problems, late departure and late arrival
10/28/2012 Fire

Infinity (n=3)

6/22/2010 Material failure
6/26/2010 5-6 hour delayed departure because of engine problems, canceled port call; five days later an electrical fire causes power loss for several hours
8/23/2012 Material failure

Millennium (n=2)

3/9/2009 Cruise canceled to allow repair of problem with bearing on propeller shaft

4/9/2013 Electrical problem adversely affects propulsion, dead in water for 3 hours; port call at Hanoi canceled

Summit (n=4)

1/10/2009 Electrical problem causes cruise to be shortened by one day and itinerary changed
2/27/2010 Material failure
4/9/2011 Loss of electrical power
10/5/2012 Tender runs aground with 93 passengers and 2 crew, sustains major damage

Pullmantur (1 ship, 2 incidents)

Zenith (n=2)

8/18/2009 Fire while docked in Stockholm, evacuated; departed one day late, itinerary changes
6/25/2013 Fire in engine room disables ship; towed to port

Royal Caribbean International (10 ships, 32 incidents)

Allure of the Seas (n=2)

1/29/2012: Fire in incinerator area
4/12/2012: Fire in engine room, section 6 of ship evacuated; drift 1-2 hours and then operated on 1 engine

Brilliance of the Seas (n=2)

10/13/2009 Windows broken out in storm and 35 passenger cabins flooded, delayed departure from Barcelona
12/12/2010 Severe list while entering Alexandria, Egypt; 30 passengers injured

Enchantment of the Seas (n=5)

7/21/2009 Material failure
3/23/2010 Load sharing problem shuts down engine 4
7/27/2011 Steering gear pump failure on pump #4
2/20/2012 Propulsion problems – one propeller broken; delayed departure by 24 hours, changed itinerary, sailing at half speed
3/10/2012 Propulsion problems; spent 27 hours in Port Canaveral to accommodate repairs, itinerary changed

Explorer of the Seas (n=7)

2/5/2009 Propeller damaged causes change in itinerary on this cruise and next
4/14/2009 Changes in itinerary for several upcoming cruises; too late to cancel, no explanation
9/30/2009 Collision with *Carnival Legend*; minor damage
1/13/2010 Delayed departure because delayed arrival from drydock
3/14/2010 Severe list due to human error; injuries and considerable damage
9/14/2012 Collision with *Norwegian Star* when mooring line breaks; minimal damage
10/29/2012 Sailed into Hurricane Sandy

Grandeur of the Seas (n=3)

2/26/2009 Loss of two engines; material failure
7/30/2009 Loss of power due to malfunctioning power inverter; loss of electrical power
5/27/2013 Fire; cruise canceled

Jewel of the Seas (n=3)

8/3/2010 One hydraulic motor not working forcing reduced speeds; itinerary changes

12/7/2010	Collision with 500 meter long 2 foot wide flexible plastic pipe, becoming wrapped around front of ship
9/6/2012	4.5 hour delay leaving Cape Liberty; no reason given

Legend of the Seas (n=2)

2/9/2009	Pulled into Key West for unscheduled stop because of faulty azipod and leaking oil (needed boom around ship); repaired by day's end
1/30/2012	Fire in bar (Café Promenade)

Majesty of the Sea (n=4)

8/13/2010	Lifeboat malfunction when lowered; damaged and release of oil
9/30/2011	Vessel maneuverability
11/2/2011	Material failure
11/7/2011	Material failure

Oasis of the Seas (n=2)

5/7/2010	Emergency generator damaged; given three months to repair
11/16/2012	Vessel maneuverability

Radiance of the Seas (n=2)

11/25/2009	Collision with <i>Carnival Splendor</i> in Puerto Vallarta; minor damage
1/27/2011	Ship is operating under USCG COTP due to one of two main propulsion azipods not working; repairs anticipated in fall 2011

C. PRESTIGE CRUISE HOLDINGS (3 companies, 5 ships, 14 incidents)

Norwegian Cruise Line (2 ships, 4 incidents)

Norwegian Dawn (n=2)

11/27/2009	Loss of power for hours (no A/C), ship disembarks in San Juan instead of Miami; this and next cruise canceled
8/27/2010	Leaves Bermuda 11 hours early because engine problems cause slower speeds; want to arrive in NYC on time

Norwegian Star (n=2)

4/28/2012	Collision while docking
9/14/2012	Collision with <i>Explorer of the Seas</i> when mooring line breaks; minimal damage

Oceania Cruise (1 ship, 3 incidents)

Regatta (n=3)

6/20/2011	Material failure
7/24/2011	Material failure
10/19/2012	Electrical outage; delayed return to port (NYC) by several hours

Regent Seven Seas Cruises (2 ships, 7 incidents)

Seven Seas Navigator (n=2)

10/25/2011	Material failure; one day delayed departure from Charleston, itinerary change
11/9/2011	Material failure

Seven Seas Voyager (n=5)

3/22/2009	Propulsion problems (fishing net caught in azipod), reduced speed; many ports canceled
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4/1/2009	Passengers told upon embarkation that most port calls canceled from Dubai to Rome because of propulsion problems; following two cruises canceled
12/14/2009	One azipod fails so sailing at reduced speed; port call canceled
10/4/2010	Podded propulsion system fails; passengers flown home from Athens, 2 cruises canceled
3/17/2013	Propulsion problem; skipped ports and itinerary changes

D. INDEPENDENT CRUISE LINES

Avalon Waterways (1 ship, 3 incidents)

Avalon Tranquility (n=3)

7/23/2009	Collision with the tall ship Schoenbrunn, a 1912-built paddlesteamer
9/5/2011	Collision with cargo ship – holed, cruise ended
12/13/2011	Fire in generator room

Celebration Cruises (1 ship, 2 incidents)

Bahamas Celebration (n=2)

2/1/2012	Maneuverability problems
3/30/2012	Maneuverability problems

Fred Olsen Cruises (1 ship, 2 incidents)

Black Watch (n=2)

10/21/2009	Severe list – navigational error while entering La Coruna Harbour (Spain)
8/12/2010	Collision with iceberg – damage superficial

Mediterranean Shipping Company (MSC) (2 ships, 5 incidents)

Opera (n=3)

3/30/2011	Collision with pier (twice), damage to several cabins; delayed 10 hours for repairs
5/15/2011	Failure of an electric panel causes power loss for 8.5 hours; towed to port and cruise canceled
5/27/2011	Detained by UK authorities for noncompliance with safety regulations

Poesia (n=2)

1/7/2012	Ran aground in Bahamas; waited for high tide to refloat
1/10/2012	Collision with pier while leaving Jamaican port

Saga Cruises (1 ship, 3 incidents)

Saga Ruby (n=3)

10/12/2009	Collision with pier, emergency repairs to bow; itinerary changes
11/11/2012	Engine problems; remainder of cruise canceled
1/7/2013	Mechanical problems with crankshaft; current world cruise delayed ten days

Silversea Cruises (1 ship, 2 incidents)

Silver Shadow (n=2)

3/19/12	Collision with container ship off Vietnam; major damage to container ship, minor damage to cruise ship
9/9/2012	Material failure

Thomson Cruises (1 ship, 3 incidents)

Thomson Dream (n=3)

7/25/2010	Plumbing/sewage problems
1/17/2011	Starboard engine fire
5/20/2012	Severe list following two maneuvers caused by "slip of the hand"; major damage

Travel Dynamics International (1 ship, 3 incidents)

Clelia II (n=3)

12/26/2009	Propeller damaged, loss of power; escorted to port, next cruise canceled
9/1/2010	Loss of electrical power (human error)
12/9/2010	Wave in storm breaks bridge window; damage to electronics, affecting engine performance

Voyages of Discovery/Coastal and Maritime Voyages (1 ship, 4 incidents)

Discovery (n=4)

10/15/2009	Engine problems; port missed
12/05/2009	Delayed return from drydock; itinerary changed
3/4/2013	Ship detained in UK for safety issues; cruise canceled
5/7/2013	Deep cleaning after illness outbreak delays departure; itinerary change

Part Three

Design, Safety Equipment, and Safety Procedure Considerations on Large Cruise Ships

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DESIGN, SAFETY EQUIPMENT AND SAFETY PROCEEDURE CONSIDERATIONS ON LARGE CRUISE SHIPS

Although these ships are larger than ever seen before and future ships planned are even larger we are still applying traditional legislative concepts, many of which are redundant because of the size of ship and the number and type of passengers carried.

The management philosophy of the Cruise ship companies do not conform to traditional marine industry concepts either. The greatest change is that the ships are now more belonging to the hotel and entertainment industry than the marine industry yet they are on the sea and safety must still be of prime concern.

The advent of the 'Hotel Ship' is unique in marine experience. The change can only be compared to the advent of the offshore oil and gas industry which after attempting to conform to IMO SOLAS legislation found that these were not adequate. After the UK North Sea Piper Alpha disaster the oil industry on the UK government instructions had to adopt their own safety systems with the additional training and equipment requirements. The governing body OPITO now controls the training for this while the platforms now have to conform to The UK health and Safety Authority, not that of the UK maritime Coast Guard Agency and the IMO legislation's, except for FSPO, which have dual safety legislative bodies.

From this I put the case forward that while certain areas of SOLAS still can apply, there are many that cannot now apply and enhancement of these must be made either by the IMO or more appropriately by the Flag States involved, either where the ship is registered, or required by the states where the passengers are being embarked. This I suggest points the way for a separate legislative body, as in the oil and gas industry, to oversee the safety construction and equipment for these vessels.

Even without this, there is now a need for Flag State enhancement of SOLAS legislation to enable the safety requirements of these ships to be of the standard required now and in the future.

THE CRITERIA OF EVACUATION.

When any study of design of both ship and equipment is made, the prime consideration is the safety of those on board and, in the final analysis, to have the ability to abandon the ship successfully. For this we must adopt a worse case model. Obviously a hurricane, while possible, cannot be imposed on companies as the standards required would be prohibitive but a medium can be assumed.

. The IMO "Guidelines for a Simplified Evacuation Analysis for New and Existing Passenger Ships" covered by MSC Circ 1033 and its successor MSC Circ 1238 recommend a maximum allowable total passenger ship evacuation time to be in the range of 60 to 80 minutes, the difference in time being for the number of vertical fire zones.

The assessment is based on the following:

5.1 the crew will immediately be at the evacuation duty stations ready to assist the Passengers.

It is my experience that this never occurs, especially at night. As a benchmark, 10 minutes should be allowed for this. A small proportion of the crew will not appear at their correct stations at all.

.5.2 passengers follow the signage system and crew instructions (i.e., route selection is not predicted by the analysis);

With emergency lighting, (not considered in the model) and possibly smoke, the signage and routing will be obscured. As the numbers grow, the crew routing instructions will slow down.

.5.3 smoke, heat and toxic fire products present in fire effluent are not considered to impact passenger/crew performance.

This is quite a surprising statement. The Department of Health of New York states

'Inhaling smoke for a short time can cause immediate and acute effects. Smoke is irritating to the eyes, nose, and throat, and its odour may be nauseating. Studies have shown that some people exposed to heavy smoke have temporary changes in lung function, which makes breathing more difficult. Inhaling carbon monoxide decreases the body's oxygen supply. This can cause headaches, reduce alertness, and aggravate a heart condition known as angina.'

Smoke will completely hamper evacuation particularly as the cruise ships do not have smoke hoods in the cabins. How do we intend to get them out?

.5.4 family group behaviour is not considered in the analysis.

This is particularly important. Families, if apart, will separate from crew instructions to look for their family members, especially if parents are on the upper decks at the time of the alarms and their children are in their cabins several decks below.

.5.5 ship motion, heel, and trim are not considered.

Again a most important factor. Any rolling of the ship hampers movement, especially amongst those not experienced in movement during rolling. Any list or rolling will particularly hamper the infirm and disabled, especially those in wheelchairs. The question remains as to how these ships intend to move the wheelchair bound passengers down several decks without lifts.

I Suggest Force 5 winds with a 5 meter sea from trough to crest together with a five degree list and a 10 degree roll giving a maximum heel of 15 degrees. These figures could be considered as average for sea conditions..

Alcohol

The model has not considered the effects of alcohol. When alcohol travels through the cerebral cortex, the results can include poor judgment, becoming unreasonably confident, and a dulling of the senses. The effect of alcohol on the cerebellum is a distortion of the nerve impulses that are sent from it, which causes a lack of coordination. Alcohol is a depressant of the central nervous system, which can negatively influence ability to speak, alertness, the emotions, and, when ingested at high levels, can cause vomiting, difficulty in breathing, and even coma.

The cruise industry of today relies on a high alcohol consumption for a considerable part of its profits unlike the past where the cabin cost was the main income. This means that the old controls that used to be imposed are now gone with the result that a high proportion of passengers will be intoxicated in varying degrees. Not only the passengers. All the cruise ships have crew bars, therefore it is reasonable to assume that a small proportion of the crew will be as well. This intoxication will considerably hamper the evacuation efforts and cause a safety concern for those passengers who are sober.

One more very important criteria that has not been considered in the IMO model. The wearing of lifejackets in the ship will double the space required for passenger movement, again increasing the evacuation time. (Please see lifejacket in the safety equipment report)

Based on the above, if the cruise industry has balanced it's criteria on the model as presented by the IMO, it can be seen that it is deeply flawed. I suggest that the factors I have shown will at least double the evacuation time, which of course means that none of the existing cruise ships can pass the time criteria.

DESIGN

This Impacts heavily on the evacuation of the ship. As the decks continued to get higher, so did the lifeboats . Eventually they became too high for safe evacuation and they were moved back down to a lower distance above sea level. Unfortunately the deck space for mustering by these boats was not designed into many ships therefore the mustering of passengers is still completed in the public rooms on the upper decks. Then the lifejackets are put on and they are lead down to the boat embarkation deck. This not satisfactory for many reasons. Passengers on the upper decks have to go to their cabins, often below the boat deck and then return to the upper decks for muster. At the same time passengers are coming from their cabins and going up to the upper decks to have to go back down again to the embarkation deck. Give the situation of night time and emergency lighting , it is very easy for passengers to get mixed up and indeed lost from their group. I doubt very much if all passengers will be in the correct boats.

Further, how the cruise ship companies intend to move the hundreds of infirm and disabled passengers from their cabins to the muster station and then down to the boats, has not yet been explained. If it is by appointing crew to assist them then the passengers will have to be tagged in order that the appointed crew know their whereabouts at all times, and those crew not assigned any other duties during an emergency except the care of their passenger.

The design of these ships, with so many passengers must be such that there is space for them to muster by their boats. The space should contain seating for passengers to wait for the embarkation order. This will allow mustering to be ordered as a precaution and avoid panic. The lifejackets can then be stowed there, although what must be considered is the wisdom of wearing lifejackets in enclosed lifeboats (Please refer to lifeboat design)

Double Hulls

As these ships become larger, with more lives at risk, it becomes common sense to require double hulls. Such hulls are already required on tankers to protect the environment so surely double hulls should be required to protect lives?

For cruise ships going into ice waters, regardless of the time of year, there is still a danger from growlers and Bergy Bits as outlined in 'The Ice Navigation Manual' that I co-authored with other ice experts. Bergy Bits with exposed areas of 3 meters or over above the surface can be detected at a distance of 3 miles in calm waters, but this is considerably reduced by weather. Growlers are smaller bergy bits with their area above the surface melted down to less than 1 meter above the surface and with areas of around 20 sq. meters. Anyone who knows ice conditions knows that these can slice through steel like a knife through paper.

'Growlers are very difficult to detect visually, may not show up visually and are, consequently, very dangerous.'

The Ice Navigation Manual. House, Lloyd, Toomey and Dickens.

Cruise ship venturing into waters where these are possible should be required to have double hulls. If not, then they should be prohibited from going into such waters, even if carrying an ice pilot as such a pilot is no different than anyone else in spotting these growlers.

Navigation Lights

Owing to the intense display of lights from these vessels at night the navigation lights are becoming increasingly difficult to discern thus interfering with their intended use of discerning the direction of the vessel and the alterations of course. If these vessels are not to be required to shutter all their windows at night and shut down the deck lighting, The IMO navigation lighting requirements for these vessels are thus obsolete and a new standard should be required for these vessels.

LIFESAVING EQUIPMENT.

The Lifejacket.

The SOLAS specification for lifejackets are inadequate for all shipping regardless of type, however for those unfamiliar with the sea and safety, it is essential that the standard of lifejackets required for these ships be upgraded for the following reasons;

The standard lifejacket can injure the wearer by rising up and possibly breaking the neck. These lifejackets have changed little from the Titanic incident when many bodies were found with broken necks. Crotch straps which would prevent this from happening are not required.

There is no hood to prevent heat loss through the head or face mask to keep the or-nasal cavities clear.

The term life jacket is a misnomer as they are not jackets and do not give any warmth protection to the body.

The bulkiness of these jackets double the space required during evacuation and mustering.

The need to change the lifejacket requirements is particularly important for cruise ships going into cold waters.

'Currently, these passengers are each issued a large bulky SOLAS approved inherently buoyant lifejacket. Anyone making their way from a cabin to the upper deck for abandonment when the ship is listing or flooding has an impossible task to do this when wearing one of these or trying to drag it behind them along the companion ways, stairwells and stairs'

Markle, R.L. A Study of Life Saving Systems for Small Passenger Vessels. USCG Study March 29, 1991.

'Anyone who has spent any time in open water with any wave splash and wind understands the huge improvement in performance with the addition of a face shield and crotch strap. All who attended the expert meeting were in favour of strongly promoting face shields and crotch strap'

The conference on drowning in Amsterdam in June 2002.

Lifeboats

According to the LSA code 2010, the lifeboats, which are allowed to carry up to 150 persons will be boarded in 10 minutes. Which is 15 per minute or if you like, a passenger every 4 seconds.

This is impossible, especially with enclosed lifeboats which are boarded through narrow openings.

We must also question whether 150 persons can get into lifeboats approved for this number.

The space and weight allocation defined in the 2003 IMO Life Saving Appliance (LSA) Code [27] are too low. The 430 mm buttock width and 75 kg average weight were established many years ago, before people started to grow taller and expand their girth. For many years now, most survival training schools have realized that it has not been possible to load any of the lifeboats to full capacity, even when the students were just wearing work coveralls and no lifejackets.

'In 2005, a typical maritime offshore oil training class of 41 people was measured in Dartmouth, Nova Scotia (39 male, 3 female). Their ages ranged from 18 – 56 years. Over 70% of the group measured in work clothes only exceeded the 430 mm space allocation at the hips, and the shoulders were even wider. The average weight was 87 kg, 12 kg over the IMO specification.'

A human factors study on the compatibility between human anthropometry, ship abandonment suits and the fit in a representative sample of lifeboats – A preliminary report on 41 subjects. Proceeding of the 4th International Congress on Maritime Technological Innovations and Research, Barcelona, Spain, 95-102.

Brooks, C., Kozey, J., Dewey, S. and Howard, K. (2005).

No lifeboat is currently designed for disabled persons yet ashore whole cities are being adapted.

Lifeboats can still only be provided for 75% of the persons on board. This places the cruise ships in the same position of the Titanic. To put this in perspective, with a ship having 8000 persons on board, 2000 will have to rely on liferafts.

No would be passengers for these ships are informed of this.

What is the policy for deciding who gets into a lifeboat and who gets into a liferaft?

If, as shown above, the lifeboats cannot hold the number of persons they are certificated for, then where do these excess passengers go?

Life-rafts

Life-rafts have been a large step forward in saving life at sea however to rely on life-rafts as lifeboat replacement is wrong and unsafe. Such an interpretation is not placed on conventional merchant ships where the lifeboat capacity is required for ALL on board so why is this allowed on cruise ships where there are far more persons and many totally untrained or familiar with the sea?

The capacity of liferafts is the same as that for lifeboats

'the number of persons having an average mass of 75 kilogrammes, all wearing either immersion suits and lifejackets or, in the case of davit-launched liferafts, that can be seated with sufficient comfort and headroom without interfering with the operation of any of the liferaft's equipment.'

As previously stated, the average weight was proven to be 87 Kg without any extra weight. If the weight of immersion suits, wet clothing and lifejackets, I suggest that a conservative figure can be assumed to be at least 90Kg which means that the capacity is now now one fifth of that stated. Thus a 25 person liferaft is now only capable of holding 20 persons and a 60 person liferaft only capable of holding 48 persons.

Life-rafts have been proven to be difficult if not impossible to board in certain conditions. In strong winds they can blow away, elderly, infirm, disabled, children and injured persons will find them difficult to board even in good weather.

"A patrolling C-130 happened to be in the area and dropped life rafts and we made some effort to get into the life rafts, but we couldn't. The rafts are almost impossible to board, especially if you are in a weakened state."

Seward Phoenix Log, August 21, 1997
By Roger Kane
Sail S Sank in Bering Sea (Tug)

The life-rafts have to be boarded when they are in the water which means that the passengers have to rely on their lifejackets.

Trinity 11

"Inflating the life raft on deck — instead of throwing the canister containing the life raft into the water, which was the proper method and was clearly illustrated in the launching instructions posted where the life rafts were stowed — caused the life raft to blow away from the deck in the hurricane-force winds and vanish in the rough seas,"

Trinity 11 inquiry, NTSB

Boarding a liferaft with a standard SOLAS lifejacket on is very difficult.

Total Lifeboat and Liferaft Capacity

Based on the IMO design weight requirement for lifeboats of 75 kg If we conservatively assume that those persons in the lifeboats wear only light clothing and thus using the Dartmouth trial weight of 87 kg and that those in the liferafts are more protected and weigh an average of 90 kg we have a situation where on a 4000 person ship, out of the 3000 persons in lifeboats there will be no room for 300 persons assigned there and on the liferafts, no room for 100.

Where are these 400 persons to go?

Smoke Hoods

Presently these are not required on cruise ships.

'Victoria relayed this information to my father and they began to get dressed so they could escape their room. As they dressed, thick black toxic smoke began to fill the corridors and began to seep under the doorway of their cabin. After dressing, they grabbed towels and began to wet them so that they could be used to aid them in safely escaping the fire.'

Once they opened their cabin door they were unable to see due to the thick black smoke. They then got down on their hands and knees with the wet towels wrapped around their faces for protection and began to crawl towards the nearest exit. They remembered an exit being located close to their cabin and began crawling in that direction. Once they reached the exit, they could see flames coming from the other side of the door and knew it was not safe to exit at that location.

The corridor continued to fill with smoke and their visibility was zero. There was no emergency lighting to aid them or any emergency response team to assist them. Victoria held on to the back of my father's T-shirt as he attempted to lead them through the corridor to safety.'

Statement from Princess Cruise ship passenger

I suggest that this statement makes the case for smoke hoods to be placed in every cabin.

PROCEEDURES

Warm Clothing

Under SOLAS, all on board, passengers and crew are required to have warm clothing and to wear this at muster, in order that they recognise the need to wear this for abandonment and for the ships crew to check that they have this.

As this is a SOLAS requirement, why is it disregarded by the Cruise companies?

The requirement for bringing warm clothing with them is not promulgated prior to joining nor are they checked at muster for warm clothing.

Jumping from the ship

The SOLAS training manual 3.2. states that the following procedure be followed when jumping from a ship wearing the standard lifejacket.

Check the water for debris

Hold your nose and cover your mouth with your left hand

Check to see the life jacket is tied and all the straps secured

Cross over your left hand with your right hand and hold on to the lifejacket collar

Hold your elbows down to the side

Keep the legs together as you jump. Cross over the ankles will help with this.

As this is a SOLAS requirement, why are passengers not instructed in this at their muster stations and by notices in cabins and on the decks?

From the SOLAS training manual

The recommended maximum height for jumping in the water with a lifejacket on is 4.5 meters? As most of the open deck space on the cruise ships is now above this height, why are not passengers again instructed about this and why are there not notices posted on these decks warning of the dangers?

EQUIPMENT

Man overboard systems.

Under the Cruise Safety Act, Man overboard systems are required assuming they are available. Several companies have indicated that they are available but the cruise lines have not moved forward with the installation of this equipment. As reported in the Miami Herald November 16, 2013.

"Chief operating officer Kevin Walker said his company has now installed man overboard systems on 30 ships. Some are passive, which detect falling objects by their heat temperature and record images. An active system, which the company also provides, sounds an alarm if someone goes over. Depending on the setup, a system can cost \$250,000-\$500,000 per ship."

Acoustic hailing Devices

To protect cruise ships from Terrorists attacks, the CVSSA also requires that the vessel shall be equipped with a sufficient number of operable acoustic hailing or other such warning devices to provide communication capability around the entire vessel when operating in high risk areas. This has not been complied with and this industry needs to have this equipment install.

SUMMARY OF RECOMMENDATIONS

That the Criteria for evacuation and abandonment be made taking into account all factors of weather, heel and list, darkness, distance from the muster point to the boat embarkation position, number of elderly, infirm and handicapped persons on board, possible fire and smoke and estimated number of intoxicated persons on board.

That a strict no alcohol policy for all crew members be enforced with random alcohol testing.

That Cruise ships be designed and retrofitted to ensure that the muster station can be by the boats with ample space for assembly and waiting for the embarkation order. It is further recommended that each muster station be supplied with a first aid pack and a defibrillator. That the muster station be where passengers are supplied with their lifejackets. At the same time, lifejackets be also stored on the upper decks in case of inability to use the muster points.

That a study be made as to the feasibility of passengers embarking enclosed lifeboats without lifejackets.

That all cruise ships be required to adopt double hulls exactly the same as the oil and chemical carriers.

That the lifeboat and liferaft spaces be re-evaluated in line with the study carried out at Dartmouth and that the boats be re-certificated for the number of passengers to be carried under the new space findings.

That all cruise ships should carry sufficient lifeboats for ALL on board in line with the standard merchant ship requirements.

That a number of lifeboats specifically designed for disabled passengers be carried. That the cabins for disabled passengers be required to be on the same or next to the embarkation deck. Until this can be applied that there be a limitation on the number of disabled passengers carried.

That the consumption of alcohol be better controlled. That the age limitation be strictly enforced and that inebriated passengers be confined until they are sober for the safety of other passengers and in case of abandonment.

That all lifejackets be replaced for a type that incorporates a hood, face mask and crotch strap. That an evaluation be made for the use of inflatable lifejackets.

That notices be placed on all open upper decks above 4.5 meters stating that it is dangerous to jump from these decks with lifejackets on.

That the procedure for pumping into the water with lifejackets on be stated and demonstrated at the muster and a notice be in each cabin.

That passengers are advised of the warm clothing requirement before joining and that the warning of this clothing at the muster be strictly enforced.

That either all external lighting except for the navigation lights be extinguished and windows curtained, or that the navigation lights fitted be increased in size and brightness.

That on cruises of over two weeks duration, every two weeks, all passengers be mustered at their muster point and that all lifeboats are placed in the embarkation position.

That the uniforms on board reflect the responsibility and that the executive officers (Deck department) and engineer officers can be well defined from the hotel staff. That the hotel staff wear clothing and rank/rating markings that cannot be confused with the traditional seamen officers of the ship who will be giving the command orders during any emergency.

That sufficient seamen department personnel are carried to enable each lifeboat to carry 3 and each liferaft have 1. These should not be hotel, entertainment or catering staff.

That Man Overboard Systems be install in line with the requirement of the CVSSA.

That Acoustic hailing Devices need to be added to protect cruise ships from Terriosts attacks

Part Four

Summary of Action to be Taken

Section 1: By Captain Michael Lloyd

Section 2: By Dr. Ross Klein

Part Four

Section 1

THE FLAG STATE

Throughout these various laws and convention resolutions, references have been frequently made to the responsibilities of the Flag State. It is therefore necessary that we should have an understanding of the responsibilities of the Flag State and that State's obligations under these statutes.

Taken from UNCLOS article 91:

- 1. Every State shall fix the conditions for the grant of its nationality to ships, for the registration of ships in its territory, and for the right to fly its flag. Ships have the nationality of the State whose flag they are entitled to fly. There must exist a genuine link between the State and the ship.*
- 2. Every State shall issue to ships to which it has granted the right to fly its flag documents to that effect.*

Duties of the Flag State.

Taken from UNCLOS Article 94 of the Law of the Sea

- 1. Every State shall effectively exercise its jurisdiction and control in administrative, technical and social matters over ships flying its flag.*
- 2. In particular every State shall:*
 - (b) Assume jurisdiction under its internal law over each ship flying its flag and its master, officers and crew in respect of administrative, technical and social matters concerning the ship.*
- 6. A State which has clear grounds to believe that proper jurisdiction and control with respect to a ship have not been exercised may report the facts to the flag State. Upon receiving such a report, the flag State shall investigate the matter and, if appropriate, take any action necessary to remedy the situation.*
- 7. Each State shall cause an inquiry to be held by or before a suitably qualified person or persons into every marine casualty or incident of navigation on the high seas involving a ship flying its flag and causing loss of life or serious injury to nationals of another State or serious damage to ships or installations of another State or to the marine environment. The flag State and the other State shall*

cooperate in the conduct of any inquiry held by that other State into any such marine casualty or incident of navigation.

Paragraph 2 b stating the Flag States jurisdiction under its internal law over the vessel, gives rise to the requirement that vessels carry a copy of that state's Maritime and Civil law to ensure compliance. In the management of the ship it is prudent to have an understanding of the State's laws, especially where they might differ from the norm.

Paragraph 7 is also of special interest. Basically this means that in any incident on the High Seas, only the Flag State can hold an inquiry into the incident regardless of what other States are involved. Of course it states that the Flag State shall cooperate with another State's inquiries but the onus of the investigation remains with the Flag State.

IMO Resolution A912(22) Annex 1 States that a Flag State should;

- *Provide for the enforcement of its national laws, including the associated investigative and penalty processes.*
- *Take appropriate action against ships flying its flag that fail to comply with applicable requirements.*
- *Ensure the availability of sufficient personnel with maritime and technical expertise to carry out its flag state responsibilities including;*
 - *The development and enforcement of necessary national laws*
 - *The reporting of casualties and incidents as required by the respective instruments to which the flag state is a Party.*

From both Article 94 of UNCLOS and IMO resolution A912 there can be no doubt that on the high seas, it is the responsibility of the Flag state to enforce its laws, to report and to investigate any casualty or incident on its flag ships.

Equally while a ship is within the internal waters of a State, then that State has jurisdiction over that ship and its national laws apply. This then places the obligation on a state to investigate any crime or incident that is against its national laws, even after that ship has sailed while it is in the territorial waters of that State.

It does not have such powers over that ship for any incident that occurs on the high seas prior to that ship's arrival unless the ship is of that country's flag.

The Marine Industry is international and a situation that requires international agreement cannot be dealt with piecemeal. It is the registration of ships in states unable or unwilling to fulfil their obligations that is causing the problem, and it is a problem that, with the cruise ships carrying thousands of passengers increasing, is becoming out of control.

The most obvious solution is to stop the registration of non-national ships by states with no proper resources to comply with UNCLOS, especially cruise ships, which effectively places thousands of innocent passengers in a situation of legal disenfranchisement and allows the cruise companies to operate their own private police forces that too often place corporate image before proper and effective judicial process. Most of these flag states apart from not having the criminal investigative staff in place, do not have even the properly qualified marine investigative personnel with the expertise for dealing with serious incidents at sea, with the result that it becomes too easy for shipping managers to cover up such incidents which if properly investigated, could lead to criminal prosecution of the managers.

If Flag States are to be allowed to retain their right to register ships even though they cannot or will not honour their obligations, some form of international marine investigative body that is empowered to investigate both serious accident and criminal matters is required that all ships and nations can call on. Member States that do not have the resources to comply with their obligations can then call on or be required to engage such a force to act on their behalf.

Already, many nations have some marine investigative organisation and these could be linked and their remit expanded. The Marine Accident Investigators' International Forum could be the basis for advice and assistance in formulating a proper and effective international marine investigative force.

Part Four

Section 2

Additional recommendations*

In addition to changes in the manner in which cruise ships are regulated by Flag states, various other safety issues to be addressed as per this report. Additional recommendations are as follows:

Recommendation #1: There is a need for systematic reporting of all cruise ship incidents to an independent, central authority charged with responsibility for data analysis and policy and operational recommendations.

Recommendation #2: Similar to data maintained on airlines documenting "on time" performance, there should be a mechanism whereby cruise ships and cruise lines have reported their adherence to itineraries and on time performance.

Recommendation #3: There is need for greater oversight and monitoring of the cruise industry in order to monitor changing trends and to determine whether these changes are related to changes in safety and/or casualties.

Recommendation #4: Ships operating from U.S. ports should be obligatorily subject to accident investigations by the National Transportation Safety Board as a condition of using U.S. ports, and should be subject to the same fines and other administrative actions the NTSB is empowered to take with other modes of commercial transportation.

Recommendation #5: There needs to be funded research, ideally provided by the cruise industry to a wholly independent body, to learn from those cruise lines that appear to be effective in reducing incidents and accidents

Recommendation #6: Ships should have thorough and exhaustive safety inspections by the U.S. Coast Guard without advance warning. Full reports (including all details) of cruise ship inspections by the U.S. Coast Guard should be available online.

- A more complete analysis can be found in the Klein report dated July 24th before the Senate hearing.

Part Five

Attachment of Correspondence

1. **ICV Letter Requesting Participation in NTSB Forum Panel – February 12, 2014**
2. **NTSB letter to ICV denying Request – February 21, 2014**
3. **ICV Follow-Up Letter to NTSB Asking for Reconsideration – February 26, 2014**

Kendall Carver

From: Kendall Carver [Kcarver17@cox.net]
Sent: Wednesday, February 12, 2014 11:33 AM
To: Eric B. Emery PhD (eric.emery@ntsb.gov)
Cc: (Devon_Barnhart@commerce.senate.gov)
Subject: Cruise Ships: Examining Safety, Operations and Oversight
Attachments: Popular Mechanics 3-2014.pdf; THE INVESTIGATION OF ACCIDENTS AND CRIME AT SE1-final.doc; CV Private and Confidential .doc; Gaouette Security Professional Resume - Copy.docx; ICV Comments - Crimes at Sea 'Revised Edition'.pdf

Eric...

I appreciate your providing me with the proposed agenda titled, "Cruise Ships: Examining Safety, Operations and Oversight," and in response an ICV Executive Committee meeting was called to review your proposed agenda.

The entire committee strongly supports your oversight and is pleased that the NTSB is to review the issues on your agenda. Given that International Cruise Victims is the leading grass-roots organization in the world concerned with these issues we feel that input from ICV would not only be pertinent but valuable in structuring a balanced stakeholder's forum. Since you may not be familiar with the background or range of expertise of ICV, please allow me to briefly review the history and structure of our organization.

ICV was started on January 1, 2006 with just four families who had tragic experiences on cruise ships, stemming from a range of issues concerned with ship safety and security. That organization of victims and friends has now grown to include membership in 24 countries around the world while becoming the voice for change and improvement in all areas of cruise ship operations which involve passenger and crew safety.

The worldwide media reaches out to ICV now when any newsworthy or major incident occurs on board a cruise ship; **regardless of whether the incident involves a fire, a breakdown, an illness outbreak, or a crime because of the experts we have in our organization.** Armed with those authorities and experts, IVC became the lead sponsor of the Cruise Vessel Security and Safety Act of 2010. I personally have testified at four House and Senate hearings along with other victims and friends of ICV. This legislation addresses structural issues, regulatory issues and safety issues on cruise ships. As a direct result of that legislation and our continued efforts to increase safety, ICV now maintains a separate organization in Australia and Europe.

The Australian government held hearings last year at which ICV testified and provided substantial material which led the Australian House of Representatives Standing Committee on Social Policy and Legal Affairs to issue a final report calling for laws to be introduced to address the issues of safety on cruise ships. Mark Brimble, an ICV Executive Committee member and President of ICV of Australia, testified at the hearings as did I. In preparation for that hearing another member of the Executive Committee of ICV, Mark Gaouette, a former security head for a large passenger cruise line and global security professional, prepared an extensive 50 page report which you will find attached as well as his resume.

Another member of our Executive Committee is Captain Michael Lloyd, RD**, MNM, FNI, RNR, widely published author of such articles and publications as, "Lifeboats" and "Fire Systems" for Safety At Sea and "Pilotage" for Nautical Institute; a 35 year veteran sea captain and a current marine director and adviser. Captain Lloyd's most recent publication which was presented in London at the Wellington House has received wide press coverage. His resume and recent paper are attached.

Over the years, as a result of our growth and the continued need for cruise line oversight, ICV has expanded its board to include experts and well-known authorities in various fields so that many areas involving cruise ship safety might be addressed in an expert manner. As a result, the unique talent of this group has made it the major voice in the world regarding the very issues you are seeking to address. Our legal counsel on the Executive Committee is Phil Gerson of Gerson and Swartz PA in Miami, Florida. He is an extremely well known legal expert in many areas including Maritime issues. He also serves as Chairman of the Board for the National Center for Victims of Crime in Washington D.C.

In addition to our distinguished Board, Dr. Ross Klein serves as an academic friend of ICV. Dr. Klein is a professor at Memorial University of Newfoundland in St. John's, Newfoundland, Canada and is online at www.cruisejunkie.com. He has prepared many extensive papers which have been the subject of Senate hearings in both 2012 and 2013. His extensive papers review many of the safety issues on cruise ships and can be viewed on his website.

Eric, in summary, ICV does have the expertise and the willingness to address the major issues of Safety on Cruise ships and we respectfully request that we become part of these panels. ICV is truly a stakeholder and needs to have a voice in order for you to present a fair and balanced program. For instance, ICV can address the fact that the IMO's regulatory framework, which is already the lowest common denominator, is further attenuated when the enforcement of those regulations is left up to the flag states.

Our experts can offer insight into serious gaps in that regulatory framework; implications of these gaps and make recommendations for how the NTSB can work more closely and cooperatively with those involved to close them. These concerns were best voiced by Jim Hall in a Newsweek article in which he said the following:

"Jim Hall, head of the National Transportation Safety Board during the Clinton administration, says the industry is watched over by "paper tigers" like the International Maritime Organization and suffers from "bad actors" much like in the poorly regulated motor-coach industry, which saw its latest fatal bus crash in Southern California earlier this month. "The maritime industry is the oldest transportation industry around. We're talking centuries. It's a culture that has never been broken as the aviation industry was, and you see evidence of that culture in the [Costa Concordia] accident," says Hall.

Ships may seem and feel American but are mostly "flagged" in countries like the Bahamas or Panama in order to operate outside of what he says are reasonable safety standards. "It is, and has been, an outlaw industry," says Hall. "People who book cruises should be aware of that."

In addition to the IMO, your regulatory review should also include a review of the CVSSA which was passed in 2010, which logically would in turn lead to a discussion of the recent GAO report (which included input from ICV in their study) and the need to further strengthen the CVSSA legislation as is currently proposed in H.R. 2800 and S.1340. ICV was the chief sponsor of this legislation as well.

ICV is certainly able to address certain issues in the areas of vessel operations as well as emergency response given that we are after all, passengers and crew. We are familiar with the way in which lifeboat drills are held and managed. We are keenly aware of the fact that current onboard practices create a situation that increases (rather than decreases) the likelihood of major loss of life during a serious ship casualty.

Finally, with regards to corporate oversight, ICV has been dealing with the cruise industry in earnest since 2005; some of our friends much longer even, so we know how the cruise industry works, how they oversee their vessels from a passenger perspective, a crew perspective and through participation in EIGHT congressional hearings on the issue of cruise ships safety. We have become quite familiar with the cruise industry's tendency to do only what they are REQUIRED to do. We believe strongly that our analysis, expertly given, will present a picture of the industry that supports the need for a more vigilant program of recommendations from the NTSB.

The world wide press has turned to ICV because of our extensive knowledge and background information on the cruise line industry. For example, Popular Mechanics included a major article in their March issue just released this week titled "*Troubled Waters - Cruise Lines have stumbled badly over Safety. Here's what they need to do.*" This article was based largely on information furnished to them by ICV. A copy is attached which you might find of interest.

Dr. Klein, Capt. Michael Lloyd, Phil Gerson, myself and others are committed to attending this meeting assuming it is structured so as to allow for a free interchange of the issues. ICV is the only worldwide organization from these unique perspectives that is addressing these issues and we look forward to hearing from you.

Kendall Carver
Chairman
International Cruise Victims Association, Inc
International Cruise Victims Association of the UK, LTD
kcarver17@cox.net
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Office of the Chairman

National Transportation Safety Board

Washington, DC 20594

February 21, 2014

Mr. Kendall Carver
Chairman
International Cruise Victims Association, Inc.
4747 E. Elliot Road #29598
Phoenix, AZ 85044
Kcarver17@cox.net

Dear Mr. Carver:

Thank you for contacting the National Transportation Safety Board (NTSB) regarding our upcoming forum on cruise ship safety, scheduled for March 25-26, 2014. Our forum will discuss the regulatory framework for the oversight of the cruise industry, how accidents are investigated, ship design and fire protection, vessel operations, emergency response, and corporate oversight. Participating in the forum are the US Coast Guard, the International Maritime Organization, cruise line representatives, pilots, and classification societies. These panelists have been selected for their technical and operational expertise in the issue areas to be discussed.

I certainly understand your concern that the International Cruise Victims Association, Inc. (ICV) will not directly participate in the forum. However, rest assured that the safety interests of families are always on the mind of the NTSB. As you know, we have a statutory mandate to coordinate assistance and provide information to victims and family members of those impacted by major aviation and rail passenger disasters. Although not required by law, as a matter of routine, we also offer our transportation disaster assistance team to support accidents involving other modes of transportation which are investigated by the NTSB.

I would like to meet with you before the forum takes place so that we can discuss in more detail the safety concerns of the ICV regarding the cruise ship industry. Please contact Reshan Blackwell of my staff at reshan.blackwell@ntsb.gov, (202) 314-6662.

As the independent investigator of transportation accidents, we work hard to provide the voice for the public to improve safety for all. I keep this goal at the forefront of my thoughts when I participate in our public meetings, and I will do so in the cruise ship forum.

I look forward to meeting with you soon.

Sincerely,

 **Deborah A.P. Hersman**
Chairman
Approved for Electronic Transmission
No Hard Copy Will Follow

Kendall Carver

From: Kendall Carver [Kcarver17@cox.net]
Sent: Wednesday, February 26, 2014 9:39 AM
To: Reshan Blackwell (reshan.blackwell@ntsb.gov)
Subject: Memo to Chairman Hersman
Attachments: CG-Lax Regulations.pdf; 7-24-13 Cruise Industry Hearing Excerpt - Amended.doc; M Michael Lloyd reaction to Travel Weekly article on lax regulation.doc

Dear Chairman Hersman..

Now that our meeting will be taking place by phone, I thought it a good idea to write out ahead of time our concerns over not being allowed to participate in the NTSB March panel discussion on cruise ship safety.

I am working off the assumption that you have seen our letter appealing to you for a place on that panel so I don't want to be redundant here but we at ICV are extremely fearful that the structure of this meeting as the current agenda stands will not produce a fair and balanced overview of the cruise industry. Instead, it seems designed to assist the cruise industry with their desire to impress the public with all they are doing to insure passenger and ship safety. We would sincerely appreciate the chance to discuss with you exactly why we are of this opinion. Given that national media has continued to published weekly major articles as well as news segments regarding safety issues on cruise ships, now would seem to be a perfect time for this panel discussion with NTSB to come out in support of the cruise industry which would, if all goes the way the cruise lines hope, counter the continuous negative press they are receiving (except of course, in Travel related media where selling cruises is the goal).

The business model the cruise industry is based upon has ships registered in foreign flag states, which are for the most part known as, "runaway flags", which simply and sadly put translates into countries who are not going to enforce the regulations the ships are expected to adhere to. In addition, they have hired many who have held high positions within various federal agencies such as the Coast Guard, FBI and the NTSB to be their consultants and spokesmen to the public. I would like to review why we have come to this conclusion.

Over the past several years many cruise line incidents have been in the news. One was the fire on the Carnival Splendor; another the Carnival Triumph. In the case of the Carnival Splendor, the ship had been inspected by the USCG the day prior to sailing. However, in the subsequent investigation, it was determined that the fire system on this relatively new ship had been installed incorrectly. This was documented in a Houston Local 2 NBC news show. As the problematic cycle continues, the next jurisdictional issue stemmed from the fact that since the ship was registered in Panama, (a "runaway" flag state) only Panama could take action. To the best of our knowledge, even though thousands of lives were put at risk, no action was taken to fine Carnival Cruise Lines.

In the case of the Carnival Triumph, the subject of a Dec 17, 2013 Anderson Cooper show, this ship was out of compliance with SOLAS for more than one year and yet nothing was done and the ship passed its inspection. Yet again, even though thousands of lives were put at risk no action was taken against Carnival by the US or the flag state. It seems that history would tell us that if this had been two similar fires so close together in the aviation industry, flights would have been grounded and hearings would have been held. Where is the equivalent in the cruise industry?

Your opening panel discusses the issue of how the industry is regulated. According to your agenda, this will include representatives of the cruise lines, the IMO, flag states and the U.S. Coast Guard. I am attaching an article that was published in October of 2013 titled, "*Lax Regulation of Cruise Lines is a Myth.*" As part of their business plan, as I mentioned earlier, the industry has frequently hired retired, high ranking regulators as their spokesmen. Reading the attached article you would draw the conclusion that the Coast Guard is saying that cruise ships are high regulated.

I am attaching comments on this article by Capt Michael Lloyd. In addition a blog put out by maritime attorney Jim Walker. In this article, he indicates the following:

Cruise industry teams up with retired Coast Guard officials and uses official Coast Guard logo to sell cruises.

What do you do when you are a Rear-Admiral and ready to retire? Go into business with the cruise industry as a consultant. Write editorials praising the cruise lines. Leave glowing comments whenever CLIA CEO Christine Duffy writes an article praising the cruise lines. When cruise ships begin to ignite to the right and left of you, tell the public that cruising is the safest and most regulated form of transportation. Be sure to say that you and your family love to cruise all of the time. Use photos of yourself still wearing your uniform and medals. Use the official logo of your former federal agency you no longer work for. No one will know the difference. But whatever you do, don't admit that you work for CLIA. Don't explain that the Splendor and the Triumph cruise ships both caught on fire the day or two after the so-called "rigorous" Coast Guard inspections.



Don't worry that the Coast Guard will protest your unauthorized use of federal uniforms and official logos. That's because everyone at the Coast Guard will eventually end up working for the cruise lines too.

This approach, we suspect, is exactly what the theme will be at the March 25th-26 meeting. One difference being that CLIA has now hired the former head of the NTSB in addition to CG and FBI officials to be their spokesmen whose job it is to show the public how safe they are. Attached is the transcript from the July 24th hearing in which your former Chairman, Mark Rosenker, represented CLIA. It is important that you read the attached where you will see the following comments:

Senator Rockefeller: "So, Mr. Rosenker, I will just highlight my statement. Yes, you're the former chairman of the National Transportation Safety Board; and, yes, you are also the CLIA-appointed panel of experts – you belong to that. But, you see, that doesn't make you a free actor. That makes you a part of the system."

ICV was formed by just four families on January 1, 2006. This organization is now made up of members and friends from 24 countries around the world. Where we started off with just victims, talent with great expertise in the Maritime industry has sought us out and joined our organization. We very respectfully requested that our experts be allowed to participate in your panel in order to present a fair and balanced program. We would again request that the insight of our experts be included so that the NTSB will be not be called up short for this oversight.

As seen in the attached transcript, Dr. Ross Klein indicates the following:

"And I recall, due to Senator Rockefeller's comment, the -- that the CEO of CLIA -- it was suggested that perhaps CLIA should have a conversation with me -- now, I don't take this personally -- and the CEO turned to me and says, "Yes, we will be talking to him because he may have some valuable insights. That's 16 months ago, and I've received no call. And I'm not hurt. This is -- it's not an ego, but I think it reflects that, if you're not one of us, you have nothing to offer to us that can help us."

In response to your letter to me, one of our Executive members indicated the following to me, "Just imagine how that is going to sound to the public at large, that the only organization in the world of its kind, devoted to overseeing cruise passenger safety and security is kept from participating in a panel on cruise ship safety."

Again, we felt it was important that you understand our position before we speak on Friday.

Ken Carver, Chairman
Jamie Barnett, President

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CC: Sen. Rockefeller
Rep Doris Matsui