



CONFITARMA
Confederazione Italiana Armatori

CARDS *for*

SAFE WORK PRACTICES

On board ships

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Prevention

Rules for a proper use of electric installations and electrical equipments

- Make sure that the equipment is supplied with certifications, approvals, warranties, instructions of use;
- Use the equipment according to the instructions;
- Do not tamper with equipment and/or installations
- Never intervene in case of failure, improvising yourself as electricians, in particular, do not intervene on electrical panel, or electric cabinets
- Make sure of the location of the electrical panel that powers the area in which you operate in order to quickly remove power in case of emergency;
- Do not cover or hide with cabinets or other furniture the control and switchboards, to allow for their inspection and prompt intervention in case of abnormalities
- Replace damaged plugs, sockets and cables by applying to the ship's electricians;
- Make sure that power cables of electrical tools are properly protected against mechanical actions (passing of people, sharp objects, etc...) thermal actions (heat sources) or chemical actions (corrosive substances);
- Report immediately the presences of any damaged cables and exposed conductive parts;
- Never remove the safety guard of an equipment;
- Make sure that the power supply is removed before making any operation of installation (ever simply replacing a light bulb) or on electrical tools;
- Report immediately any defects and/or abnormalities in the functioning of electric installations and electrical appliances;
- Report the tool's components worn out or damaged for a ready repair or replacement;
- Request the examination of apparatus in which liquids have entered or which had accidental abnormal mechanical shock, such as accidental fall to the ground;
- Report immediately the smell of burning rubber, the feeling of itching in contact with an electrical device or machinery, the crackle within an electrical tool
- Connect the equipment with a suitable outlet 10A (smaller) or 16A (larger) in relation to the size of the plug (diameter of the pin);
- Always make sure that the appliance is not powered before you pull out the plug;
- Connect the equipment to the nearest plug avoiding, as much as possible, the use of extensions. When using rolled up extensions, always unroll them completely;
- Do not overload electrical outlets with too many users through electrical adapters or multiple plugs;
- Do not store flammable substances near any electrical appliances, or deposit above them containers filled with liquid
- Do not expose electrical equipments to excessive radiation or heat sources;
- Do not prevent proper ventilation of electrical appliances
- Avoid using electric stoves as they may overload the plant and they may cause fires;
- Do not touch the electric installation and/or electrical equipment if you have wet hands, or wet shoes;
- Do not use water to extinguish fires of electrical origin;
- Pay attention to the safety signs and comply with their provisions.



REMEMBER

First aid in case of electrocution

In case of electrocution, to provide first aid to the accident, it is necessary:

- Secure the area;
- Disconnect (using appropriate insulation precautions) the injured person from the power source;
- Check if the injured person breathes (otherwise proceed with artificial respiration);
- Check the pulse of the injured person (if not beat proceed with chest compressions);
- Monitor the injured person for 24 hours because during this period a cardiac arrest could happen;
- Verify the presence of any fractures;
- Consider the possibility of any internal bleeding;
- Treat the burns at points of entry and exit of the electrical current



Prevention

Practical rules in fire prevention on board

- don't smoke or, at least, always throw butts in the ash trays;
- check that the lights in the room where paints and solvent are stored are gastight and protected against impacts;
- do not extend electrical cables over hot, sharp or abrasive places; if a piece of electric cable is damaged, it must not be patched up, but replace it entirely;
- carry out the workshop works in compliance with safety rules, and always keep, on hand, a fire extinguisher of suitable type to the case;
- scrupulously follow the rules for the storage, handling and use of solvents, paints and chemicals;
- respect the rules of accident prevention, because accidents are often the cause of fire;
- avoid misunderstandings in interpersonal communication owing to environmental noise, defective media and lack of understanding among people who speak different languages.



REMEMBER

First aid in case of burns

In burns do not count only the "degree of heat" which someone is exposed, but also the "time of exposure to heat" and especially the percentage of body surface concerned. A consolation: more the burns are painful, less they are clinically serious, because this is an indication that the tissues are still alive and will regenerate.

There are three degrees of burns:

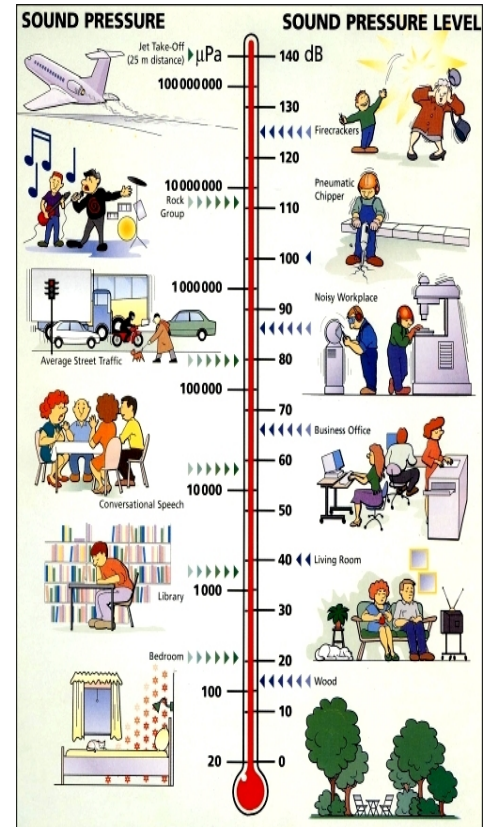
- 1st grade: erythema (redness sore), healing without scars;
- 2nd grade: blistered erythema (with detaching blisters). Pay attention to infections that leave flat discoloured scars;
- 3rd grade: charred eschars that leave scars when healed;
- make cold sponging for 20 minutes (with common water and possibly with sterile gauze, then cream and a soft protective bandage);
- the blisters should be sterilely treated (they heal first if you break the dead raised skin, that it's painless and once the serum is discharged, then a sterile gauze is left on. The gauze will be easily removed, moistening her with hydrogen peroxide; do not tear the scab that detaches by itself);
- eschars must be sterilely medicated with creams that protect the painful edges; tetanus and medical therapy are important here.



Examples of typical level of noise DB(A)

The table below is an example of noise levels in different places. Its purpose is to enable personnel to appreciate when and where there is exposure to a potential harmful noise

120 dB (A)	60 meters from a jet that takes off. Among two diesel generators operated at 1800 rpm.
110 dB (A)	In a small ship with a main engine at 900 rpm and diesel generator at 1500 rpm.
105 dB (A)	1 meter from the head of a cylinder of a diesel motor with low speed (120 rpm)
100 dB (A)	between two diesel generators in operation at 600 rpm
95 d(B)	at the end of an engine flat or in an catwalk of an engine room with a main diesel engine at low speed.
90 dB (A)	engine workshop; the less noisy area in the engine room
80 dB (A)	15 meters from a pneumatic drill
70 dB (A)	noise of big housewives equipment (distance of 3 meters) from the vacu-me tube.
60 dB (A)	inside a big public building (eg a supermarket)
50 dB (A)	inside a house in the suburbs by day.
40 dB (A)	quiet area of business district of a city at night. The whisper in a library at a distance of one meter.
25-30 dB (A)	noise level in the countryside at night, in the absence of wind. A quiet church.
0	limit of hearing of a young person of normal hearing



Prevention

Practical Rules of noise prevention

The only measure of prevention applicable on board is reduced to:

- Before entering the engine room areas or other noisy places, always put the earmuffs or disposable earplugs, even if it will be a very brief stay in the area.
- Submit to the medical check up by the company physician.

REMEMBER

First Aid Otorhino

- In case of severe traumas, like those related to an explosion or the entrance of a foreign body in the ear, it is necessary to intervene with the techniques of first aid for the treatment of wounds.
- However, it should be noted that the major source of hearing damage is not caused by accidental trauma, but the continuing failure to comply with the duty to use protective devices whenever you enter a noisy place.

Prevention

Rules in preventing vibration

Damage from vibration is due to the effect of the reduced blood flow and mechanical stress in the articulations exposed, so:

- Always use gloves and/or protective footwear, even for brief interventions;
- Avoid smoking and assumption of alcohol when exposed to hand-arm vibration; the smoke for its vasoconstrictor effect and alcohol for reducing the circulation in the areas most stressed by vibration, that are the articulations of the hand, wrist, elbow and shoulder;
- Use clothing that protects the articulations from the cold: the low temperatures strengthening the harmful effects of vibration;
- Avoid large meals before exposure to vibration: a poor digestion requires a considerable flow of blood to the stomach, and thus reducing the flow to the articulations subjected to vibration;
- Use appropriate equipment designed in compliance with ergonomic principles and granting, according to the work to be done, the least possible vibration;
- Limit the duration and intensity of exposure;
- Submit to the check up conducted by the company physician;
- Using electric or pneumatic tools as hammers, chisels, etc, use shoes to insulate the body from vibration caused by the tools;
- In case of rough sea conditions, reduce the speed of the ship.



Prevention

Practical rules for thermal prevention

HOT CLIMATES

Sun protection

- Cover oneself up. Wear baggy clothes, shirts with long sleeves and long pants;
- Use ointment with sunscreen factor of at least 30. Follow the instructions kept in the package;
- Wear a broad-brimmed hat, not base ball caps, because it protects best the neck, ears, eyes, forehead, nose and head;
- For eye protection, wear sunglasses that absorb the UV rays. It is not necessary that the glasses are expensive, but they must block by 90 to 100% of UV rays and UVB radiation. Before buying a pair of sunglasses, read carefully the description label;
- Avoid, if possible, exposure to the sun.

Heat protection

- Drink frequently small amounts of water.
- Wear light-coloured, wide and transpirable clothes. Cotton is great.
- Make breaks in the shade.
- Eat light before starting work.
- Avoid coffee, alcohol and large amounts of sugar

COLD CLIMATE

- During the inspection and/or work in cold environments (cold rooms, coolers, etc.) always use the protective jackets, even for brief interventions.
- Keep the extremities warm, through the use of gloves and hats.
- Cover oneself up. Wear woollen clothing, shirt with long sleeves and long trousers.
- Use creams that prevent cracked lips and hands.
- Wear a hat, preferably wool, and if it does not interfere with specific activity, ear protections are recommended.
- Wear shoes or boots with double padded socks.
- Do not drink alcohol
- For eye protection, wear sunglasses that absorb the UV rays. It is not necessary that the glasses are expensive, but they must block by 90 to 100% of UV rays and UVB radiation. Before buying a pair of sunglasses, read carefully the description label;

COLD SHOCK OR THERMAL SHOCK

When working on deck or over side :

- Wear the life jacket.
- Wear clothing with good insulating properties and waterproof or watertight rubber suits.
- If you fall into the sea, cling, if possible, a float support and do not try to swim before symptoms have disappeared



REMEMBER

First Aid Thermal

- In case of burns take action as soon as possible by cooling the area with cool water, avoid the ice because it can cause a thermal shock (the area becomes cyanotic because the blood flow by the heat is blocked in the area where the ice is applied). Then apply a protective ointment (eg. foille) to avoid dehydration and /or infections.
- In case of heat stroke, remove quickly the person from the heat source and position him/her in a ventilated place and cool the body by immersion in fresh water or, alternatively, by applying on the abdomen, the sides of the neck, groin and behind the knees, towels or similar immersed in cold water. Repeat the operation very often.
- In case of cold shock, remove wet clothing and replace them with other dry; remove the person from the water and place him/her in a temperate zone. Do not give alcohol and do not rub the body.

Prevention

Practical Rules for prevention of contamination

- Always use personal protective equipments
- Replace personal protective equipments contaminated
- Don't disperse the contaminants in the environment
- Withdraw people not essential
- Remove contamination from surfaces with specific absorbent material wearing appropriate gloves compatible with the chemical in question
- Immediately inform the safety officer about the presence of any unpleasant odours or other abnormal situations in the workplace
- Analyze carefully the safety data sheet that accompanies the chemical element in use
- Keep open the containers of hazardous products only for as long as necessary
- Avoid the pouring of dangerous products in containers not suitable, with no indication on content
- Observe the instructions on the labels
- Check that the suction and ventilation system are properly working .



REMEMBER

First Aid Contamination

- Lavish first aid if necessary.
- Decontaminate any exposed skin with running water, showers, eyewash, antidotes, neutralizing, etc., depending on the substance. It is important, however, to know the instructions in the SDS.
- In case of eye contact, it is fundamental, as soon as possible, to arrange an eye wash with running water (eg from a tap), taking care to keep eyelids wide open to expose the eye to direct contact with water. In case the injured person is unable to open his eyes due to the pain, fill a syringe with water and place the nozzle between the two lids on the external side of the eye (from the side close to the ear) and inoculate the contents, repeat several times. Then apply ophthalmic anti-inflammatory ointment and antibiotics to protect the possible superficial lesion from infections.
- In case of ingestion or inhalation of chemicals, prepare the first aid measures provided by the technical data sheet for that specific product

Prevention

Practical rule for prevention

Tetanus prevention

- Always use personal prevention equipments
- Wear garments covering much body as possible
- Make the tetanus prevention vaccination according the following plan:
 - 1st dose at time 0
 - 2nd dose after 20 – 40 days from the first one
 - 3rd dose after 6 12 months after the second one
- A recall must be done after 10 years
- In case of dangerous wound in a vaccinated person from less ten 5 years the tetanus vaccination is not required



Legionary disease prevention

- Wash with water and sodium hypochlorite evaporative coolers, shower heads, faucet aerators and ice making machines

Tick prevention

- After excursions in gardens and/or woods, the participants must be checked prior to enter into the ship, in order to detect the possible presence of insects or ticks on clothing. This basic procedure is necessary especially during the period from April to November when the presence of ticks is more frequent. The most dangerous ticks for transmitting the Lyme disease are living in the mountains

Malaria Prevention:

- Use repellent creams, wear clothing that cover most of the surface of the body, use mosquito nets to the portholes, doors, windows, and if necessary even in bed. In anticipation of a stay in countries at risk, it is essential, before the departure of the ship to these areas, to start a prophylactic anti-malarial which however does not guarantee protection, because there are some strains of malaria parasite resistant to all drugs currently on the market.

REMEMBER

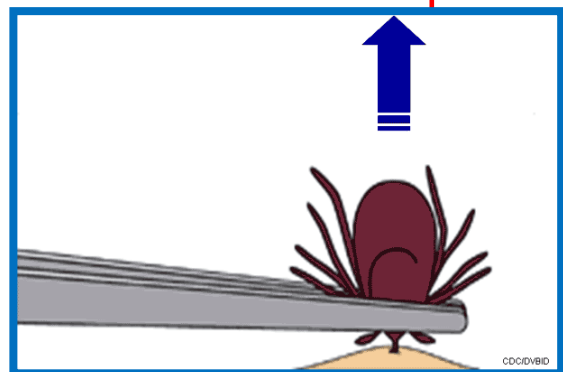
First Aid

Tetanus: In case of wounds at risk to persons not covered by tetanus immunoprophylaxis, do within 24 h the seroprophylaxis against tetanus.

Tick bites: The bite of the tick in itself is not dangerous, unfortunately, can transmit a serious disease (Lyme disease). If you find a tick on the skin, use tweezers or, in lack of them a cotton thread by turning around the tick at the point close to its attack on the skin, do not pull abruptly, but make a constant pull to remove the animal from cute.

There are two options as a result of this operation:

1. you have totally removed the tick and, if so, compliments. Shorter is the period of contact lesser is the chance of infection for the Lyme. It will be necessary to determine, through a physician, only an antibiotic as a preventive measure.
2. you have removed the body but not the head of the tick that still remained in the cute. Don't worry, the head alone can no longer transmit the disease, however, it is essential the removal of the head through, for example, a sterilized needle in the same way with which you remove a splinter.

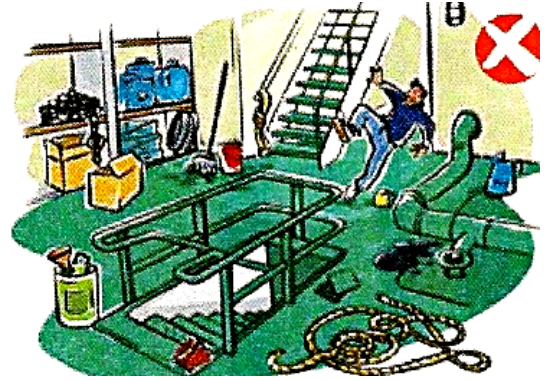


Slip, trip and fall

Slip, trip, fall are so frequent hazards on a ship that most of the times we are not even aware, nor we think of the consequences that these hazards can have on our health and our safety. Aboard a ship, each one is responsible for himself and his colleagues. And your duty is to report any risk, danger and missed incident you note

Possible causes of slipping, tripping and fall are:

- Inadequate footwear.
- Precipitation and haste.
- Bridge or uneven floor or level changes.
- Worn or unstable floor.
- Slippery surfaces.
- Spilling of oil, grease, water, dust, granules and gels.
- Poor lighting.



Prevention

Practical rules for Prevention

- Maintain all work areas tidy.
- In case of spilling, collect it and clean up immediately.
- Report any potential hazard.
- Keep the floors in perfect cleaned conditions.
- Place appropriate signs in risk areas.
- Adjust the lighting according to the type of work to be performed.
- Remove any potential obstacles from the floor.
- Keep to the handrail when the vessel rolls or in a marked pitching.



REMEMBER

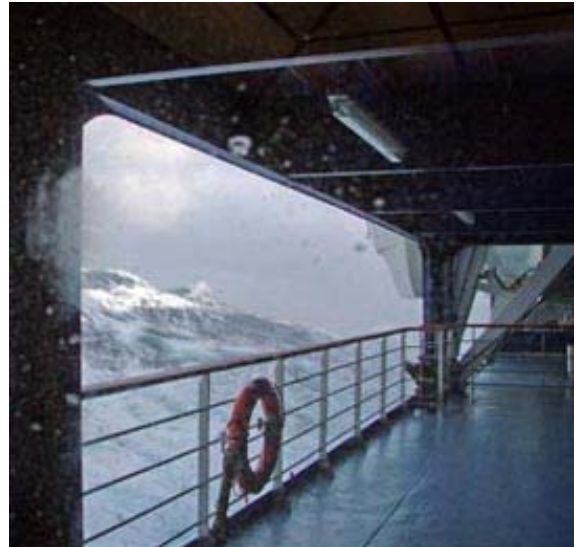
First Aid Trauma

- In the event of a fall, slip or trip, make sure that there are no fractures or distortions.
- If in doubt, immobilize the part of grieving and transfer the victim to the ship's hospital

Prevention

To prevent accidents on deck in bad weather:

- The first measures is to reduce to an absolute minimum the exit of staff on external decks. Before leaving the port, the objects on deck must be properly lashed and controlled. Similarly, at the end of the workday, all tools must be properly arranged and lashed.
- The hatches must be closed and watertight, the weather doors closed, the derricks or cranes lowered and firmly lashed
- The anchors must be lashed and locked with the stopper, and the accesses to the chain lockers must be closed and casehardened .
- Life-saving equipment must be checked to make sure they are properly lashed
- Any air intake that will not be used, should be closed.
- Containers, vehicles and cargo timber or packages must have the lashes well tight. Particular attention should be given to the drums.
- The portholes and their storm covers must be closed.
- Safety handrails should be laid out to facilitate the movement of personnel if necessary.



The protection of personnel

Nowadays, we can predict the arrival of bad weather in advance and, if possible, avoid it.

However, if this is not possible, to minimize the effects of bad weather, the Master, as well as implementing the precautions suggested by the maritime experience and partly mentioned above, must be very careful about the safety of the personnel that must go on deck.

The suggested measures for the protection of the personnel are:

- No member of the crew must go on deck unless authorized.
 - Personnel who have to go on deck for essential reasons, must always be under visual control by the officer on watch on the bridge and, if this is not possible, there must be a person who monitors at a distance.
 - The team on deck and the surveillance team should be in direct radio contact through walkie talkie.
 - During the operations on deck, the vessel must remain with the stern to the wind and the sea or if this is not possible, keep the wind and the sea on the bow. In this last case, if necessary, further reducing the speed.
 - During the night, the lights should be lit to help the personnel to perform their intervention as quickly as possible. The personnel have to bring the flashlights in case the lights outside are turned off for any reason.
 - They should be wearing protective clothing and lifejackets.
 - The coats are not suitable for strong winds, because they can swell, increasing the pressure of the wind on the person, and thus increasing the possibility of falling overboard and being dragged underwater.
 - All personnel should be informed and trained about the dangers of bad weather, in order to not underestimate them. Discipline and training are the key elements to prevent accidents on deck in bad weather
-

Permits for entry into enclosed spaces

The entry permits must be issued each time that a person is requested to enter confined spaces where his life may be at risk.

Only to classify the level of risk related to the atmosphere inside a confined space, the following factors should be considered:

- Current status of ventilation
- Type of ventilation adopted (natural or forced)
- Effectiveness of devices for ventilation
- Adjacent compartments containing dangerous substances
- Presence of sediments or other substances which can cause oxygen deficiency (e.g. presence of still water or moisture with the formation of rust), gases, flammable or toxic vapors.



In any case, when there is not exact information on the nature of the space in which you must enter, this should be considered at high risk. The following additional provisions must also be kept in particular consideration:

- For any reason you must not enter a risky confined space except with the presence of the officer in charge and, when requested, the liaison person.
- No one should enter into an area at high risk for delivering help to people in difficulty, without first having taken adequate precautions for their safety. This is to avoid risks to their lives and to avoid to further compromise the position of those who sought help.

If, during the stay in the closed space, you have difficulty or you are in danger, the enclosed space must be evacuated immediately.

CAUTION



A EEBD (Emergency Escape Breathing Device) is a device equipped with air or oxygen that should be only used for escape from a compartment that has a hazardous atmosphere and it should NOT be used for any reason and under any circumstances, to search or to save a person.



Practical Guidelines for prevention

The rules for the use of equipment are very simple, but restrictive:

- Always use the prescribed PPE;
- Do not tamper with the equipment;
- Use the equipment for the purpose for which they were designed;
- Do not tamper with the provided security;
- During stops, disconnect the electrical and pneumatic equipment;
- Before using always test the equipment



REMEMBER First Aid Ophtalmological

- All the injuries affecting the eyes are potentially serious.
- If a foreign body is finished in the eye, try to remove the foreign material washing the eye with clean water or sterile fluid from a sealed vial.
- Do not try in any way to extract bodies stuck in the eye .



Physical damage

The human spine has been created to keep the body upright, and is of limited capacity when lifting loads.

To prevent damage, sometimes irreversible in the back, lifting a load, even if less than 30 kg, it should be appropriate to the individual capacity of the person who works and performed by the individual without any sudden movements with the back straight also in the process of squatting. The technical and operational modalities of the "manual handling" serve to reduce to the lowest the damages to the spine.

Muscle sprains are caused by sudden and abrupt movements and cause the disconnection of the muscle from the bone.

Strains consist of the muscle lesion in one part, and are also caused by sudden movements.

Prevention

Prevention is the key to prevent temporary damages such as the muscles sprains and those sometimes irreversible as the slipped disc .

This requires:

- Always follow the rules of accidents prevention.
- Always wear the lumbar belt.



REMEMBER

First aid in case of muscle sprains and strains

- Apply ice on the injured part.
- Maintain the injured as still as possible.
- Immobilize the limb.

Generality

Paints may contain toxic or irritant substances and a painting of those are unknown the physical and chemical characteristics, should not be used. Some paints, evaporating, can also cause flammable mixtures.

Interior spaces shall be adequately ventilated during painting until the space is not completely dry.

Particular care must be placed during the mixing of different components for danger of chemical reactions that can generate heat and toxic fumes.

Special precautions must be taken also when using liquids to clean oxidized surfaces or remove layers of paint.

Smoking is not allowed in areas in which painting is in progress.

Unsheltered lights, matches or other sources of ignition must be removed



Preparation and precautions

The surfaces to be painted should be brushed wet to reduce the dust of old paint, which could be toxic if inhaled. Where it is known that the dust contains lead must be used different means of brushing. The face mask must be always worn on these occasions.

If it is known that the surface to be brushed contains paint with lead, it must be used methods that do not produce dust. It is more safe to avoid or reduce the production of dust than to try to remove the dust later. Sandblasting and abrasion must be avoided.

Paint containing lead should never be burned because the fumes contain metallic lead, which is rapidly absorbed by the body.

Products used to remove rust are acid and contact with unprotected skin must be avoided. Always wear gloves and goggles.

Spray painting

In this case the crew must pay the maximum attention and should be verified by the Responsible Officer that they are properly trained and informed about the methods of operations. Personnel must wear protective clothing, overalls, gloves, mask and visor to protect their eyes.

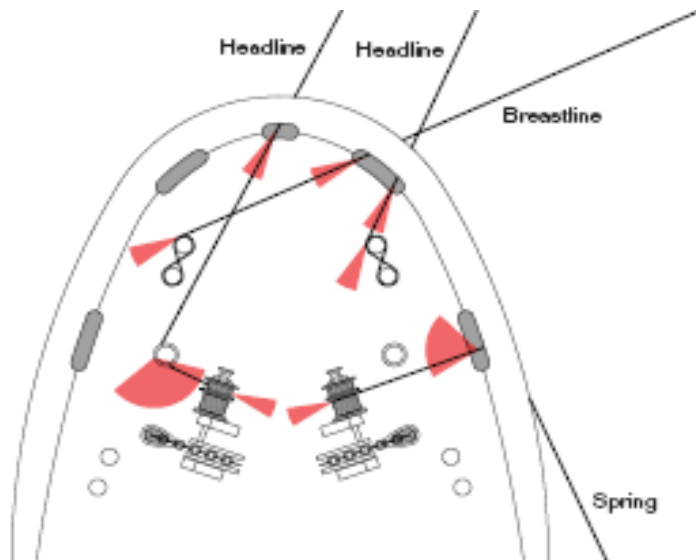
A breathing apparatus may be needed close to the affected area

Particular problems due to the pressure of ejectors can generate damages to the eyes if a special visor is not worn.



Ropes snap back

The majority of serious accidents that occur at the manoeuvring stations is due to breakage of ropes. A competent and well trained seafarer must know that, when the rope is under strain, there is a zone of snap back owing to the breakage of the rope. However, it is rare that the personnel at the manoeuvring stations is taken into account, with often fatal results.



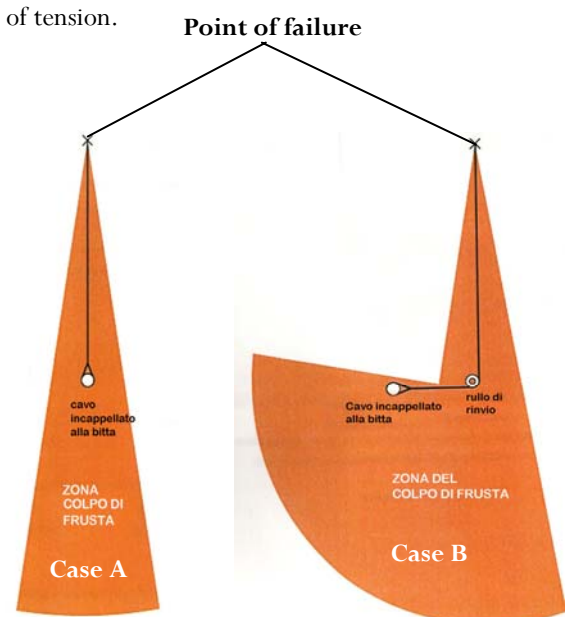
If the snap back areas are painted on the deck, the crew will be alerted of the danger when it will notice to find itself in the highlighted area.

The painting of these areas will also help supervising Officer to train the staff to remain free when the rope is under strain.



Highlighting the snap back areas, it ensures that personnel can clearly see the dangerous areas without necessarily having to think about them while working

When a rope under strain, it will snap back, starting from the remaining point of tension.



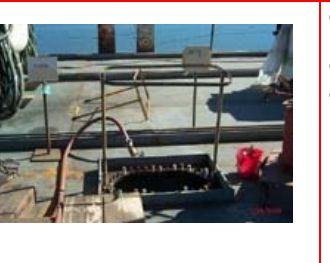
- **Case A:** If the cable can travel back in direct line, it will do so, hitting anything or any person in its path.
- **Case B:** If the cable goes around a roller fairleads, it has the potential to give a snap back on a major arc, as shown in the diagram.



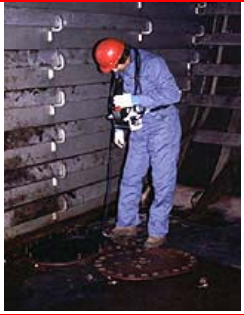

1. Preparation before clearing – Handling equipment

RISK	POSSIBLE COUNTER MEASURES
Objects falling from above (during lifting)	<ul style="list-style-type: none"> • Train employees on security procedures in work • Make a daily meeting before starting work • Provide, check and use the appropriate equipment of lifting • Employ competent person in the function of signaling and hooking • Ensure that the material which should be handled is authorized in a secure manner so that no loosen and fall
Inappropriate behavior or incorrect labor practices because of lack of experience	<ul style="list-style-type: none"> • Make the inexperienced personnel familiar with the work environment • Assign an experienced worker as work mate to an inexperienced one
<p>Before opening the porthole to eject the internal pressure</p> 	<p>One porthole for ventilation and one for access</p> 


2. Identify the exact location

RISK	POSSIBLE COUNTER MEASURES
<p>Excessive expositio to fumes and gases</p> 	<ul style="list-style-type: none"> • Apply the system of “Work Permit” for confined spaces • Make the control of the presence of gas with a well calibrated instrument, well maintained, before and during entry into the restricted space • Undertake regular check of the presence of gas when the work take place in a tank, and equip at least a worker of the group with a personal gas detector • Ensure the equipment for emergency recovery, and that re-scuers are in stand by position
<p>Lack of oxygen</p> 	<ul style="list-style-type: none"> • Provide an adequate ventilation system • Provide at least one worker in the group with a gas detector, and then carry out checks at determined intervals
<p>Slipping and tripping</p> 	<ul style="list-style-type: none"> • Ensure that there are available a sufficient number of anti explosion lights in the work area and in the routes of access • Remove any obstacles in the work area and routes of access • So not leave unprotected openings: close or provide them with protection

3. Removal of oil residuals

RISK	POSSIBLE COUNTER MEASURES
Exposure to gases and chemical fumes	<ul style="list-style-type: none"> • Provide an adequate and effective ventilation system • Undertake regular check of gas where the work takes place in the tank, and equip at least one worker in the group with a portable gas detector.
Slipping and tripping	 <ul style="list-style-type: none"> • Ensure that there are available a sufficient number of anti explosion lights in the work area and in the routes of access • Remove any obstacles in the work area and routes of access • Have ready sawdust and small shovel
Excessive exposure to noise	 <ul style="list-style-type: none"> • Ensure that the otho protetctors are properly worn • Conduct a check on the noise and increase, if necessary, the hearing protection program

4. Cleaning of residuals and manual sleeping of the surface

RISK	POSSIBLE COUNTER MEASURES
Exposure to gases and chemical fumes	<ul style="list-style-type: none"> • Undertake regular check of gas where the work takes place in the tank, and equip at least one worker in the group with a portable gas detector.
Slipping and tripping	<ul style="list-style-type: none"> • Ensure that there are available a sufficient number of anti explosion lights in the work area and in the routes of access • Remove any obstacles in the work area and routes of access
Dermatitis due to contact of the skin with oil	 <ul style="list-style-type: none"> • Provide and use appropriate overalls, gloves and boots chemical resistant

5. Arrangement of residuals in bags

RISK	POSSIBLE COUNTER MEASURES
Exposure to gases and chemical fumes	<ul style="list-style-type: none"> • Provide an adequate and effective ventilation system • Undertake regular check of gas where the work takes place in the tank, and equip at least one worker in the group with a portable gas detector.
Slipping and tripping	<ul style="list-style-type: none"> • Ensure that there are available a sufficient number of anti explosion lights in the work area and in the routes of access • Remove any obstacles in the work area and routes of access

6. Transport of bags of residuals into bins or ashore

RISK	POSSIBLE COUNTER MEASURES
Objects falling from above (during lifting)	<ul style="list-style-type: none"> • Train personnel on safety work • Make a daily meeting before starting work • Provide, check and use the appropriate lifting equipment • Employ competent persons in the function of signaling and hoo-king • Ensure that the correct techniques are adopted for handling the material
Struck by sospende load	<ul style="list-style-type: none"> • Provide and use a guide rope for checking the swaying of the load