



D.2.2 HANDBOOK ON NAMIRG STANDARD OPERATING PROCEDURES













LEGEND

DV Distress Vessel **EBS** Emergency Breathing System **ETA** Estimated Time of Arrival FF Firefighter/Crew Member FLO Fire Liaison Officer **FRS** Fire and Rescue Services **GL** Group Leader MRCC Maritime Search and Rescue Coordination Centre MRSC Maritime Search and Rescue Sub Centre NAMIRG North Adriatic Maritime Incident Response Group **OC** Operations Commander **OSC** On Scene Coordinator **PLB** Personal Locator Beacon **SAR** Search and Rescue **SMC** Search and Rescue Mission Coordinator **SOP** Standard Operating Procedure SRR Search and Rescue Region











NAMIRG SOP 1 – NAMIRG TEAM DEPLOYMENT



PURPOSE

This SOP defines the operations in the event of a fire at sea, how the NAMIRG team is alerted, what information is necessary to plan the operations and who will be involved.

AREAS OF RESPONSIBILITY AND TASKS

Once the alarm has been received the SMC (Search and Rescue Mission Coordinator) of the MRCC/MRSC (Maritime Search and Rescue Coordination Centre or Sub Centre) responsible for the SRR (Search and Rescue Region) in which the DV (Distress Vessel) is located, who is therefore responsible for the rescue operations will determine the conditions of the ship based on the information in his/her possession, before deciding whether to send the NAMIRG team or not. For this purpose, the control room of the associated Fire and Rescue Service, namely Trieste for Italy, Koper for Slovenia and Pula for Croatia could be contacted to request that an FLO (Fire Liaison Officer) be sent to the MRCC/MRSC as a firefighting consultant.

The contacted Fire and Rescue Service will send a FLO to the requesting MRCC/MRSC.

Once the decision to activate the NAMIRG team has been taken, the MRCC/MRSC will contact the Fire and Rescue Service control room to:

- Request that a FLO be sent, if not already done so beforehand
- Request that the NAMIRG team be sent
- Provide the necessary information for the NAMIRG team

To ensure efficiency in the NAMIRG operations, it is vital to have sufficient preliminary information on the incident and distress vessel. The key information about the distress vessel is:

- its location
- type of incident
- where it occurred on the vessel
- when it occurred
- actions initiated on board the vessel and results obtained
- condition of the vessel

The Fire and Rescue Service control room contacted by the MRCC/MRSC must alert and provide any data on hand to:

- The control rooms of the other 2 countries, who will in turn alert their on-duty/offduty operators
- The on-duty NAMIRG operators













• The off-duty NAMIRG operators

The Fire and Rescue Service control room in Pula will also alert the Divulje helicopter base, gathering information on the ETA of the helicopter at Pula airport and also the other Istrian command units of the operators belonging to the NAMIRG team, which in turn will alert the on-duty/off-duty operators.

The Trieste Fire and Rescue Service control room will also alert the Venice Helicopter Command Unit of the possible use of the AB 412 helicopter located there.

The Trieste Fire and Rescue Service control room will also alert the Nautical Detachment of Porto Vecchio to prepare ATEX marine VHF radios and ATEX portable lamps located there.

The NAMIRG operators on duty will prepare their PPE and will go to Pula airport using appropriate transport means.

The off-duty NAMIRG operators who are available to assist will go to their respective command units to prepare themselves, pick-up the necessary PPE and then wait for instructions on the planned embarkation point, which they will go to as soon as possible, with appropriate transport means.

In addition to the PPE, the operators of the Trieste Command Unit, will be required to bring with them Puma radios, ATEX marine VHF radios and ATEX portable lamps, to be taken from the Nautical Detachment of Porto Vecchio.

The Pula operators, awaiting the arrival of the helicopter and other operators, will go to Pula airport and check the materials of the NAMIRG team to prepare them for boarding. If there is no NAMIRG operator in Pula, the first to arrive at the site will begin checking the material.

The NAMIRG official/officer on duty, if present, will take on the role of the NAMIRG Operations Commander (NAMIRG OC), should he/she not be present, this role will be taken on by the Team Leader who has the highest rank. If no Team Leader is present, the role will be taken on by the highest ranking Firefighter.

The NAMIRG Team Leader who has the highest rank, if present, will take on the role of NAMIRG Group Leader (NAMIRG GL); however, should he/she not be present, this role will be taken on by the highest ranking Firefighter.













The NAMIRG team and related equipment will be weighed and this data will be communicated to the helicopter crew for an evaluation of the operational range.

The NAMIRG OC and GL will gather as much information as possible about the incident until it is time to board the helicopter and, based on this information, will carry out the first risk assessment of the mission and planning of the intervention.

Once at the target, they will visually check the actual conditions of the DV, flying over it, making a second risk assessment of the incident, which will either confirm the previous one or not, and decide whether or not to proceed with the intervention.

Once the team has landed on the DV it will carry out the third risk assessment together with the ship's master and will continue to constantly monitor its status, so as to have the situation under control at all times, keeping the SMC informed.

It is necessary to remind the ship's master of the presence of the NAMIRG team on board so that he can take it into account in the event of abandoning the ship.

The NAMIRG team must always be ready to abort the mission and leave the ship, where the operating conditions would not enable the team to work safely.

The MRCC/MRSC must always ensure that there is a means to allow the emergency evacuation of the NAMIRG team at the site of the incident.

The flow of information will take place primarily between the NAMIRG OC and the SMC, or possibly through the OSC (On Scene Coordinator), if present.

The MRCC/MRSC will communicate with the Fire and Rescue Service control room of his/her country, via the FLO, if any, and this control room will keep in touch with the fire and rescue services of the other countries.

Given the operational internationality of the NAMIRG team, all operators must always carry a valid ID document for expatriation.

To get an assessment of the status of the ship as consistent and unanimous as possible, an unambiguous assessment method should be considered, so that each operator involved in the rescue can get an accurate idea of the real extent of the intervention to be addressed, thereby modulating the response and optimising the use of available resources.

A method to carry out this assessment, which has already been codified and tested, is the Vessel TRIAGE. This method originates from an international project with a broad













participation of the main sea rescue bodies in Finland, already proposed to the IMO for global use and currently used within the BSMIRG Project.

The Vessel TRIAGE method is used to identify predefined threats to the vessel and assess their severity. The method describes the safety status of the vessel with four categories: green, yellow, red or black.

Assessments are repeated as necessary depending on the duration of the incident. Changes in the threats, their severity and the Vessel TRIAGE category of the vessel indicate how the situation is developing and thus provide important information for all those participating in the operations.

The Vessel TRIAGE categories:

- Green: Vessel is safe and can be assumed to remain so
- Yellow: Vessel is currently safe, but there is a risk that the situation will get worse
- Red: Level of safety has significantly worsened or will worsen and external actions are required to ensure the safety of the people aboard
- Black: Vessel is no longer safe and has been lost

Given the number of actors involved in the activation of the NAMIRG team it could be useful to use a single form of data collection so as to locate the information in known areas, thereby simplifying and speeding up the alerting operations.

In this case, too, for uniformity of the documentation at a European level, the form envisaged by the BSMIRG Project could be taken into consideration:

• MIRG Tasking Form

In incidents where foreign firefighters need to be alerted to assist with the response, the MRCC/MRSC could use the MIRG Tasking Form as a tool. The Tasking Form is intended to serve as a checklist for the MRCC/MRSC, guiding the collection of information that is significant for MIRG operations. The use of the MIRG Tasking Form ensures that the FRS representatives and MIRG teams are provided with information that is as comprehensive as possible, enabling them to assess the preconditions for MIRG operations and the related risks.













CHECKLIST OF NAMIRG SOP 1 – NAMIRG TEAM DEPLOYMENT

1. Actions in a mobilisation phase

- Alerting
 - The control room alerted by the MRCC/MRSC must:
 - alert the FLO, if required by the MRCC/MRSC
 - alert the control rooms of other nations, which in turn will alert the NAMIRG operators on duty/off duty
 - alert the NAMIRG operators on duty
 - alert the NAMIRG operators off duty
 - Pula's control room will send the alert to the Divulje air base, requesting the helicopter ETA at Pula airport.
 - All NAMIRG operators will go to Pula airport. The operators in Trieste will take the radios and lamps (ATEX). The Pula operators will start checking the NAMIRG material at Pula airport.
 - The Trieste control room will alert the Helicopter Unit in Venice
- Preliminary information
 - To ensure efficiency in NAMIRG operations, it is vital to have sufficient preliminary information on the incident and distress vessel. The key information about the distress vessel are:
 - its location
 - type of incident
 - where it occurred on the vessel
 - when it occurred
 - actions initiated on board the vessel and results obtained
 - condition of the vessel
- The NAMIRG OC will gather all incident information so that risk assessments can be made and operations can be planned.
- All operators will make sure that they have a valid ID document for expatriation.

2. Actions on arrival at the distress vessel

- Confirming vessel assessment
 - Once the accident site is reached, the first authority on the distress vessel/in the incident area (e.g. MIRG OC or OSC) must confirm to the MRCC/MRSC whether the vessel assessment is appropriate.

3. Ongoing actions

- Monitoring identified threats
 - Identified threats must be actively monitored, and the key actors notified immediately of any changes in them.













- Mission abort
 - The NAMIRG team must always be ready to abort the mission and leave the ship, where the operating conditions would not enable the team to work safely.
 - The MRCC/MRSC must always ensure the presence of a means at the incident site to allow the NAMIRG team to be evacuated in an emergency.













NAMIRG SOP 2 - OCCUPATIONAL SAFETY DURING A NAMIRG OPERATION

PURPOSE

This SOP defines the division of responsibilities with respect to occupational safety during a NAMIRG operation and the most critical issues that must be ensured during the operation and which should be monitored constantly in order to maintain occupational safety at a sufficient level. In addition, this SOP describes how to halt the operation and evacuate the MIRG team, from the DV (distress vessel) in the event of a sudden emergency.

RESPONSIBILITY AREAS AND TASKS

In accordance with international practice, SAR operations are coordinated by the SMC (Search and Rescue Mission Coordinator, the officer of MRCC/MRSC) of the SRR (Search and Rescue Region) in which the incident occurs. The SMC is responsible for general occupational safety during the operation; that is, he or she makes decisions about whether or not to transport rescue personnel to the scene of the incident.

On the DV, the NAMIRG OC (Operations Commander) has overall responsibility for assessing the risks involved in carrying out the operation. However, each NAMIRG GL (Group Leader) holds primary responsibility for the occupational safety of NAMIRG personnel. That is, once the operation have begun, the occupational safety of personnel on location is always the responsibility of the closest supervisor in their own organisation. The same applies to all working teams on the distress vessel. For instance, if members of the distress vessel's crew are to carry out rescue work, the master of the vessel is responsible for their occupational safety.

PREVENTION TACTICS AND OCCUPATIONAL SAFETY

NAMIRG operations emphasise the importance of ensuring safety in one's own activities. In every incident, the greater the potential benefit of fire and rescue actions, the greater the risk that is accepted by commanders and firefighters. Activities that present a high risk to safety are limited to those that have the potential to save life or to prevent rapid and significant escalation of the incident.

NAMIRG operational tactics are often defensive, seeking to contain the fire in order to gain time to save people, to avoid abandoning the ship and to allow its arrival to a port refuge, unlike the offensive tactics generally employed on land. However, when circumstances are favourable, offensive tactics may also be employed:

1. Defensive - This mode may apply to a sector and/or the entire incident. The NAMIRG teams tackling the operation do not work within or are not exposed to the hazard area. The identified risks outweigh the potential benefits; no matter how many additional control measures are put into place, the risks are too great.













2. Offensive - This mode may apply to a sector and/or the entire incident. The NAMIRG teams tackling the operation work within or are exposed to the hazard area. The level of risk to crews is justifiable in terms of risk and potential benefits.

KEY ACTIONS TO ENSURE OCCUPATIONAL SAFETY DURING A NAMIRG MISSION

- The final decision on whether to board the distress vessel is made by the NAMIRG OC after the location has been reconnoitred. In all situations, both when transferring and working on board, the ability to independently ensure safety during operations must be continuously taken into consideration.
- NAMIRG Group Leaders must remain constantly aware of where their team members are and keep a log of their whereabouts.
- The MRCC/MRSC must remain constantly aware of how many people have been sent to the distress vessel to participate in rescue operations.
- When a decision is made to dispatch a NAMIRG team to the location, it must always be ensured that the team can be evacuated.
- The primary means of evacuation is a helicopter, the secondary a surface vessel in the incident area. It must be taken into consideration that in the open sea it is often very difficult or even impossible to transfer to another surface vessel or smaller support boat. An extreme emergency measure is to abandon the vessel by descending a rope into the sea.

SITUATIONS PREVENTING NAMIRG ACTION

NAMIRG teams are generally not dispatched to locations where the operating conditions would not enable them to work efficiently and safely.

In a ship fire incident, this could mean, for instance:

- The wind direction is variable. A whirling wind or lack of wind may cause a situation in which there is no "clean-air area" on the distress vessel. In such cases, it is not possible to work on the vessel, as this would require the continuous use of breathing apparatus, which is not possible in practice.
- The fire systems of the vessel might not be functional. In such cases, either the firefighting water piping on the distress vessel has to be pressurised using the systems of another ship or firefighting operations have to rely entirely on the fire hydrant system of the other ship.
- The distress vessel has listed significantly or the water used for firefighting causes further listing.
- The seas are too rough for smoke diving and moving about on the distress vessel.
- The situation on board the distress vessel is so unstable that it is apparent that the incident may escalate in an unpredictable and uncontrollable manner, such as due to materials/chemicals carried as cargo on the vessel.













• If there are indications that the incident could have been caused by an act of terrorism, it is not safe to work on board the vessel until the situation has been assessed (bomb +1 principle).

CONCLUDING THE MISSION, HALTING OPERATION AND ABANDONING THE VESSEL

Once the mission has been concluded in a controlled manner or if it must be halted without the need to abandon the vessel, the NAMIRG team is evacuated with the most suitable surface or air unit, as indicated by the MRCC/MRSC.

The decision to leave the distress vessel is made jointly by the MRCC/MRSC, master of the vessel and the NAMIRG OC (Operations Commander).

In addition, if the safety of the NAMIRG teams on board the vessel is jeopardised, or if there are other justified grounds for doing so, the operation of the NAMIRG team can be halted by a decision of the MRCC/MRSC or NAMIRG OC. The master of the vessel must always be notified of the decision to halt the mission and abandon the vessel.

If the mission must be aborted because the vessel is abandoned, the NAMIRG team primarily exits the vessel using the ship's own rescue equipment or the unit indicated by the MRCC/MRSC. In addition to the primary alternatives, the NAMIRG team must be prepared to abandon ship using its own equipment (such as ropes) to descend into the sea.

The master of the vessel should always be prepared for the eventuality that the NAMIRG team will use the equipment of the vessel to abandon it. For this reason, when the NAMIRG team has come on board the distress vessel, the master of the vessel must always also take the NAMIRG team into account in preparations for abandoning the vessel and indicate which muster station and equipment the team should use in such an event.













CHECKLIST OF NAMIRG SOP 2 - OCCUPATIONAL SAFETY DURING A NAMIRG OPERATION

1. Occupational safety responsibilities

- The SMC is responsible for general occupational safety during the operations.
- The NAMIRG OC has overall responsibility for assessing the risks involved in carrying out the operation. However, each NAMIRG Group Leader holds primary responsibility for the occupational safety of his NAMIRG personnel.
- The master of the vessel always holds responsibility for the occupational safety of the distress vessel's crew.
- 2. Assessing the operational preconditions and appropriateness of the NAMIRG operations
- When approaching the location and while at the location, assess the following issues that affect occupational safety based on preliminary information and aerial reconnaissance:
 - Risks vs. achievable benefits.
 - Is it too dangerous to use winching or other means to board the distress vessel?
 - Have any of the following factors that would weaken occupational safety and/or threaten the success of the operations on board the distress vessel been realised?
 - General working conditions on board have weakened, primarily due to:
 - strong waves
 - extent of the fire
 - spread of smoke/circulation of smoke in the winching zone, etc.
 - There are no opportunities for retreat/departure (helicopter, another vessel, abandoning ship, etc.). One means of retreat/departure must always be available.
 - Serious listing = immediate danger of the vessel capsizing. Visual observation or consulting the vessel's crew. Rule of thumb: the vessel's technical systems should work up to a 22 degree tilt, but moving aboard ship would then be very difficult or impossible.
 - The firefighting water supply no longer works.
 - The vessel's pumping systems no longer work.
 - A complete blackout in which backup lighting does not work.
 - The vessel is sinking or clearly about to sink and pumping will not help.
 - Any other direct threat to personnel.
 - Terrorism or the threat of terrorism (+1 theory).
 - When your resources are insufficient to complete the mission and no more are on their way (personnel, equipment).













- Based on your observations, make the final decision on whether to start or cancel the operation. Consider what can be achieved with the current resources.
- **3.** Emergency situation halting the mission due to sudden changes in safety circumstances
- Notify the master of the vessel and MRCC/MRSC that the mission is being halted and request the emergency evacuation of the team/teams.
- Move to the most protected location (from smoke) from which to abandon ship or be fetched by helicopter, if a helicopter is able to do so.
- If a helicopter cannot pick up the team/teams, seriously consider abandoning the distress vessel if the risks in the list above are being realised. Notify the SMC that the ship is being abandoned and test contact with the MRCC/MRSC using emergency channel 16 on the Maritime VHF radio.
- Abandoning ship:
 - Put on rescue suits
 - Muster the entire team at the assembly station
 - Check the personal rescue equipment (PLB)
 - Leave the ship using the safest available method, on the safest side, in the manner instructed in NAMIRG training:
 - Activating PLBs:
 - A: A communication device should be the primary method of contact with searchers. PLBs should only be used as a last resort.
 - B: In good conditions, the team should remain grouped in the water. Only the OC or GL should activate his/her own device. If the team is lost and has, for some reason, become separated (in difficult weather conditions, darkness, etc.), each member of the team should activate their own PLB.
 - Take watertight communication devices (Maritime VHF)
 - Take lighting and signalling devices
 - If possible, put energy bars/drink bottles in pockets
 - Descend or jump into the water from a safe place
 - Swim far away from the vessel (if the vessel sinks, there will be strong vortexes/suction, and the danger of being sucked in).
 - Make sure you have a knife to hand.
 - Form a floating chain
 - Keep the chain moving slightly to ward off the cold
 - Wait for the helicopter/surface vessel
 - Signal your presence













PURPOSE

The purpose of this SOP is to describe the key tasks and responsibilities of the Fire Liaison Officer (FLO) during the different phases of an operation.

ROLE OF THE FIRE LIAISON OFFICER

A Fire and Rescue Services (FRS) expert acts as a Fire Liaison Officer (FLO) at the Maritime Rescue Coordination Centre (MRCC/MRSC) in the event of an accident where FRS expertise is needed. The Fire Liaison Officer (FLO) works under and supports the Search and Rescue Mission Coordinator (SMC).

The task of the Fire Liaison Officer is to ensure efficient cooperation with the authorities by supporting the operations commanders in communication and command support functions. These support functions may involve, for instance, ensuring the continuity of operations, assessing the availability of additional resources, organising logistics, etc.

The Fire Liaison Officer can also be called to the MRCC/MRSC simply to assess the situation as a consultant without alerting or using the NAMIRG team or other rescue units.

DUTIES OF THE FIRE LIAISON OFFICER

- If necessary, the FLO acts as a link to the NAMIRG Operations Commander (OC) and MRCC/MRSC.
- The FLO ensures that all parties involved in the operations are kept fully informed of the NAMIRG team's actions.
- The FLO keeps the NAMIRG teams in the incident area fully informed.
- The FLO plans the continuity of NAMIRG operations in cooperation with the NAMIRG OC and SMC.

DEPLOYMENT OF THE FIRE LIAISON OFFICER

1. Actions in a mobilisation phase

After receiving the mission, the FLO must inform the other parties of his/her participation in the operations to the extent necessary (MRCC/MRSC, MIRG OC, FRSs) and transfers to the MRCC/MRSC as soon as possible.

2. Actions on arrival at the MRCC/MRSC











After having reported in to the SMC at the MRCC/MRSC, the FLO goes to his/her assigned workstation to test the functionality of the available equipment. If there are any defects, then replacements must be requested as soon as possible.

Once the FLO has received updated situational information, he/she reports the checked and supplemented information on the incident as well as information on the rescue organisation (e.g. key personnel and their contact information and the agreed communications arrangements) to those participating in the operations to the extent necessary (NAMIRG teams, FRS contact persons, etc.).

After updating the information on the incident and rescue organisation, the FLO checks and supplements the contact information for the NAMIRG teams participating in the operations and the number and operational capabilities of personnel, and confirms the transport units at the disposal of the NAMIRG teams, their transport capacities, agreed/possible embarkation points and schedules. At this time, it must also be determined which actions have already been agreed, and the situational/status information on the resources alerted to the operations must be verified (on scene, on route, mission received but not yet on route, etc.).

3. Ongoing actions

The FLO continues to update and supplement information on the incident at the same time as he/she maintains situational awareness of the NAMIRG operations. The FLO plays a key role in ensuring that the SMC and NAMIRG OC have the correct and up-todate situational information on the incident, the resources that are in use and any additional resources that might be required. The FLO must also see to it that all parties involved in the operations are kept fully informed of the NAMIRG team actions.













CHECKLIST OF NAMIRG SOP 3 - NAMIRG FIRE LIAISON OFFICER (FLO)

1. Actions in the mobilisation phase

- Report on participation in the operations to a sufficient extent.
 - MRCC/MRSC
 - NAMIRG OC
 - FRSs
- Transfer to the MRCC/MRSC.

2. Actions on arrival at the MRCC/MRSC

- Go through the preliminary information with the MRCC/MRSC
 - Precise location of the incident
 - When it occurred
 - Name and type of vessel in distress
 - Number of people involved
 - Number to be rescued
 - Hazmat Danger
 - Units alerted
 - NAMIRG teams:
 - Strength and capabilities (resources)
 - Contact information
 - ETA at embarkation point
 - ETA at distress vessel
 - Others
 - Weather conditions at the scene of the accident
- Ascertain how and from where the distress vessel will be reached:
 - Helicopter
 - Boat (own, Coast Guard, other)
- Ascertain which radio channels are to be used
- Forward the confirmed and updated information to the NAMIRG teams.

3. Ongoing actions

- Continue to obtain further information
- Act as a link between the NAMIRG Operations Commander and MRCC/MRSC
- Forward the situation information, requests, instructions, etc. issued by the NAMIRG OC to the extent necessary.
- Support the NAMIRG OC in ensuring uninterrupted operations.
 - Keep a log of:
 - Resources on the vessel
 - Resources on route













- Additional resources requested
- Assess the availability of additional resources with a focus on achieving results (Which? From where? How? When?).
- Keep a log of all key events and when they occur
 - For his own operations (FLO)
 - For NAMIRG operations
 - Time of alert
 - Time of departure
 - Number of people per team, including names
 - Time of arrival at vessel
 - Information about what is occurring at the target
 - Mission progress
 - Key orders and decisions
- Keep in contact
 - NAMIRG OC
 - NAMIRG teams that have not as yet arrived at the distress vessel
 - Participating FRS(s)
- Check that the DV is aware of the approaching team and what is required from them aboard the vessel, such as assisting the NAMIRG OC on the bridge.

4. Completion of operation

- Do any reporting associated with the mission
 - Draw up a mission report with the MIRG OC
 - Mission analysis and debriefing













NAMIRG SOP 4 - NAMIRG OPERATIONS COMMANDER (NAMIRG OC)

PURPOSE

The purpose of this SOP is to describe the key tasks and responsibilities of a NAMIRG Operations Commander (NAMIRG OC) during the different phases of an operation.

ROLE OF THE NAMIRG OPERATIONS COMMANDER

The NAMIRG Operations Commander leads NAMIRG teams (and other FRS teams) in rescue operations on the distress vessel.

The NAMIRG OC works under the Search and Rescue Mission Coordinator (SMC).

The NAMIRG OC should liaise with the master of the vessel, carry out risk assessments, establish a Command Point, provide a tactical plan inclusive of further resource requirements and communicate regular situation reports to the Maritime Rescue Coordination Centre (MRCC/MRSC) and other authorities, if needed.

The NAMIRG Operations Commander's primary focus should be to prevent the need for evacuation of the vessel and save lives. Rescuing property and preventing any threats of environmental damage is a secondary task.

DUTIES OF THE NAMIRG OPERATIONS COMMANDER

- The NAMIRG OC acts as a consultant and support in fire and rescue incidents to the master of the DV.
- The NAMIRG OC makes the tactical and operational decisions required to stabilise and contain the incident on board the distress vessel in cooperation with the master of the vessel.
- The NAMIRG OC is responsible for occupational safety during the mission.
- The NAMIRG OC ensures that the MRCC/MRSC and master of the distress vessel are kept fully informed of the NAMIRG teams' actions.

DEPLOYMENT OF THE NAMIRG OPERATIONS COMMANDER

1. Actions in a mobilisation phase

After receiving the mission, the NAMIRG OC must inform the other parties of his/her participation in the operations to the extent necessary (FLO, MRCC/MRSC, FRSs). The NAMIRG OC contacts the MRCC/MRSC and together with the SMC/FLO (if present) review the preliminary information on the incident and the distress vessel.

In addition, the NAMIRG OC informs the MRCC/MRSC of the contact information of his/her NAMIRG team, the number of personnel and their operational capabilities with respect to the mission.

The NAMIRG OC and MRCC/MRSC agree on the transport unit, the embarkation point and schedule.









NAMIRG



The NAMIRG OC and MRCC/MRSC together review the NAMIRG resources alerted to the operations and assess their adequacy and any additional resource requirements with a focus on achieving results.

2. Actions on arrival at the distress vessel

Upon his/her arrival at the distress vessel, the NAMIRG OC, together with helicopter pilot/master of the support vessel, designates the boarding point and reports it to the MRCC/MRSC. The MRCC/MRSC records this information and forwards it to the other NAMIRG teams.

After that, the NAMIRG OC contacts the master of the distress vessel to verify whether the vessel still requires external assistance.

Then he, together with the master, establishes an evacuation/rest/fire station point with no exposure to danger, clear exits from the vessel and usually close to a winching point and in a protected area of the top deck

The NAMIRG OC and master together update the situational information on the vessel, incident and rescue organisation. The aim is to enable the NAMIRG OC to establish a more detailed view of the incident status, the risks involved, the actions the crew of the vessel has taken to deal with the incident and the effectiveness of these actions.

The NAMIRG OC also informs the master of the distress vessel about the number of NAMIRG teams arriving, their operational capabilities and any support measures required (guidance, communications devices, etc.). After updating the situational information, the NAMIRG OC makes the required tactical and operational decisions on stabilising the incident together with the master and agree on where and how to set up the NAMIRG operations on-scene command point.

After these actions, the NAMIRG OC informs the MRCC/MRSC of the situation on board, the tactical and operational decisions, and the location of the NAMIRG operations on-scene command point.

If there is enough personnel on board the DV, can be established a Command Team, with the NAMIRG OC, the Command Support, and a suitable number of sector commanders. The primary duty of Command Support is to assist the NAMIRG Operations Commander in communications and maintaining the situation log. Sector commanders focus on coordinating the sectors designated by the NAMIRG Operations Commander. Coordination includes commanding and controlling the allocated resources, the tactical planning of operations in the sector and drafting a risk assessment

3. Ongoing actions









In addition to taking the required tactical and operational decisions, the NAMIRG OC ensures, with respect to NAMIRG operations, that occupational safety is maximised, operational continuity is safeguarded and information is disseminated. The NAMIRG OC ensures that the safety status of the vessel is monitored continuously and that occupational safety is upheld in all phases of the operations. In addition, the NAMIRG OC assesses the adequacy of the available resources and informs the MRCC/MRSC of any additional resource requirements with a focus on achieving results and safeguarding the continuity of NAMIRG operations. The NAMIRG OC is also responsible for ensuring that all cooperating parties are aware of the NAMIRG operations and their impact. It is especially important to ensure that the master of the vessel, the MRCC/MRSC and the NAMIRG teams on board are informed of the tactical and operational guidelines of the NAMIRG operations, etc.

4. Completion of operation

The NAMIRG OC participates in taking the decision to complete NAMIRG operations. The decision to conclude NAMIRG operations is made jointly by the master of the vessel, the NAMIRG OC and the SMC (or other authority in command). The decision may also be taken by a single party (master of the vessel, NAMIRG OC or SMC) if there is a weighty and justified reason to do so. However, in such cases, all parties involved must be informed about the completion of operations and the reasons for this.

When the decision on the completion of the NAMIRG operations is made, the NAMIRG OC provides a situation report to the master of the vessel and the SMC concerning the measures that have been performed, the results achieved, any damage, and recommendations on further actions. In addition, together with the SMC, the NAMIRG OC ensures that the decision to conclude NAMIRG operations and the reasons for this are recorded and entered in the MRCC/MRSC situation log.













CHECKLIST OF MIRG SOP 4 - NAMIRG OPERATIONS COMMANDER (NAMIRG OC)

1. Actions in a mobilisation phase

- Report on receipt of the alert
- Go through the preliminary information with the MRCC/MRSC (FLO, if available)
 - Precise location of the incident
 - Type of incident or assistance requested
 - When it occurred
 - Name and type of vessel in distress
 - Number of people involved
 - Number to be rescued
 - Hazmat Danger
 - Units alerted
 - NAMIRG team info
 - Strength and capabilities
 - Contact information
 - Embarkation point
 - ETA at embarkation point
 - ETA at the distress vessel
 - Others
 - Weather conditions at the accident site
- Ascertain how communications will be carried out
- Ascertain how and from where the distress vessel will be reached
 - Helicopter
 - Boat (own, Coast Guard, other)
- Identify the risks
- Ascertain an activation of SSAS (Ship Security Alert System) (STAND-BY)
- Mobilise the team
- Notify team departure to the FLO and MRCC/MRSC

2. Actions on arrival at the distress vessel

- Identify the risks (from helicopter/support vessel)
- Establish (with helicopter pilot/support vessel master) the boarding point
- Test communications links with MRCC/MRSC (notification of arrival on DV)
 - (FRS) radio,
 - Maritime VHF,
 - GSM,
 - SATPHONE (if present)
- Contact the master of the vessel (position Blue transit line), and ascertain that the preliminary information is correct:













- That NAMIRG assistance is still required
- The actual situation and all risks
- Extent of missing persons
- Exact position and extent of fire on board
- Any measures that have been carried out and the results achieved
- What assistance is desired
- Extent of casualties
- Any resources the vessel can offer
- The vessel's technical situation
 - Vessel stability
 - Passive fire containment
 - Status of vessel's utilities/services
- Cargo on board
- With the master of the vessel
 - Establish
 - Evacuation/rest/fire station point
 - No exposure to danger
 - Clear exits from the vessel
 - Usually close to a winching point and in a protected area of the top deck
 - Command point (the bridge of DV, if possible)
 - Agree a tactical/operational plan and decisions required to stabilise and contain the incident on board the distress vessel
- Informs the master of the DV about the NAMIRG teams arriving
 - Their operational capacities
 - Their necessities
- Give operational indications to the NAMIRG Group Leader
- Communicate to the GL the position of command/evacuation/fire station points
- Contact the MRCC/MRSC, and
 - Communicate
 - the situation
 - number of missing persons
 - number of casualties
 - the position of boarding, evacuation and command points
 - Confirm their safety level assessment and relevant threat factors
 - Determine resource requirements (for uninterrupted operations)
- Prepare to receive incoming teams (and establish a NAMIRG Command Team (if that is the case)).
- 3. Ongoing actions
- Ensure occupational safety













- The vessel's safety status
- Ongoing risk assessment
- Appoint GL to monitor smoke diving
- Conduct a risk assessment of any rescue dives
- Evaluate the sufficiency of resources
 - Compressed air
 - Reserve crews
 - Food/Drink
- Ensure uninterrupted operations
 - Evaluate the sufficiency of resources and the possible need for additional resources.
 - Inform the MRCC/MRSC (FLO) of resources needed
- With the master of the vessel
 - Evaluate the vessel firefighting systems, and the potential to utilise other firefighting techniques
 - Watertight doors
 - Smoke ventilation
 - Monitor the vessel's stability
- Keep a log of all key events and when they occur
- Keep in contact, at intervals of not more than 20 minutes, with
 - NAMIRG teams
 - MRCC/MRSC
 - FLO
- Utilise the vessel's crew
 - Expertise
 - Local knowledge

4. Completion of operation

- Provide a situation report to the distress vessel master, MRCC/MRSC and the party to which the responsibility for the incident will be transferred (if that is the case).
 - The measures that have been performed
 - The results achieved
 - The current situation
 - Any damage
 - Recommendations on further actions.
- Together with the MRCC/MRSC ensure that the decision to conclude NAMIRG operations and the reasons for that are recorded and entered in the MRCC/MRSC situation log.
 - Reasons for transferring responsibility or aborting the operation
 - To whom responsibility will be transferred













- When responsibility will be or has been transferred
- Matters agreed regarding communications and related responsibilities
- Ensure to have the information necessary to draft a final report on the operation.
 - Information on the vessel, etc.
 - Measures performed and their results
 - Contact information for the contact persons
 - Initiate preparations for the return trip.
 - Agree on transport arrangements with the MRCC/MRSC
 - Attend to assembling personnel and equipment
- Ensure that equipment and tools provided by the vessel are returned (e.g. radios, Fire/Safety Plans, etc.)
- Ensure that everyone leaves the DV safely once the mission is completed













NAMIRG SOP 5 - NAMIRG GROUP LEADER (NAMIRG GL)

PURPOSE

The purpose of this SOP is to describe the key tasks and responsibilities of a NAMIRG Group Leader (NAMIRG GL) during the different phases of an operation.

ROLE OF THE NAMIRG GROUP LEADER

The NAMIRG Group Leader leads operations at a technical level, and is responsible for smoke diving safety.

The NAMIRG GL works directly under the NAMIRG OC. The NAMIRG GL key task is to ensure the team's occupational safety. His/her primary focus should be to prevent the need for evacuation of vessel and save lives. Rescuing property and preventing any threats of environmental damage is a secondary task.

DEPLOYMENT OF THE NAMIRG GROUP LEADER

1. Actions in a mobilisation phase

After receiving the mission, the NAMIRG GL contacts the NAMIRG OPERATIONS COMMANDER and together review the preliminary information on the incident and the distress vessel

2. Actions on arrival at the distress vessel

Upon his/her arrival at the distress vessel, the NAMIRG GL receives indication about evacuation/rest/fire station points, determines the operational situation and the measures that the vessel's crew has taken, then the communication system to be used to communicate with the NAMIRG OC at the command point (FRS radios, direct channel, vessel's own communication devices)

The NAMIRG GL receives the NAMIRG team task from the NAMIRG OC and then he/she asks a Fire/Safety Plan to determine any resources the vessel can offer and to plan the team task together with the crew officer coordinating firefighting operations The NAMIRG GL organizes the transit line system:

- Green: Embarkation Point to Fire Station
- Blue: Fire Station to Command Point
- Red: Fire Station to Scene of Operations
- Yellow: Fire Station to Evacuation Point

3. Ongoing actions

During the operation, the NAMIRG GL ensures that occupational safety is maximised.













The NAMIRG GL monitors smoke diving, conducts a risk assessment of any rescue dives and evaluates the sufficiency of resources, air bottles, reserve personnel and food and drink.

The NAMIRG GL utilises vessel's crew expertise.

4. Completion of operation

When the NAMIRG OC communicates the decision to complete NAMIRG operations the NAMIRG GL ensures that equipment and tools provided by the vessel are returned (e.g. radios, Fire/Safety Plans, etc.) and that everyone leaves the distress vessel safely.













CHECKLIST OF NAMIRG SOP 5 - NAMIRG GROUP LEADER (NAMIRG GL)

1. Actions in a mobilisation phase

- Report on receipt of the alert
- Go through the preliminary information with the NAMIRG OC, or the FLO:
 - Precise location of the incident
 - Type of incident or assistance requested
 - Name and type of vessel in distress
 - Condition of the vessel (electricity, firefighting systems, operability)
 - Number of people involved
 - Number to be rescued
 - Hazmat Danger
 - Units alerted
 - NAMIRG team info
 - Strength and capabilities
 - Contact information
 - Embarkation point
 - ETA at embarkation point
 - ETA at distress vessel
 - Others
 - Weather conditions at the accident site
- Ascertain how communications will be carried out
- Ascertain how and from where the distress vessel will be reached
 - Helicopter
 - Boat (own, Coast Guard, other)
- Identify the risks
- Test communications
 - VHF marine radios
 - FRS radios
 - Spare batteries
- Notify team departure to the Fire Liaison Officer

2. Actions on arrival at the distress vessel

- Contact the on-scene NAMIRG OC.
 - Determine:
 - The actual situation
 - The team's task
 - Any resources the vessel can offer
 - The vessel's technical situation
 - Evacuation/rest/fire station point













- Procedures
- Verify:
 - Any measures that have been carried out and the results achieved
 - Communications (FRS radios, direct channel, vessel's own communication devices)
- Organize the transit line system:
 - Green: Embarkation Point to Fire Station
 - Blue: Fire Station to Command Point
 - Red: Fire Station to Scene of Operations
 - Yellow: Fire Station to Evacuation Point
- Draw up an action plan
 - Utilise the vessel's Fire/Safety Plan
- Equip crews in pairs

3. Ongoing actions

- Ensure occupational safety
 - The vessel's safety status
 - Ongoing risk assessment
- Monitor smoke diving
 - Conduct a risk assessment of any rescue dives
 - Evaluate the sufficiency of resources
 - Compressed air
 - Reserve crews
 - Food/Drink
- Evaluate the sufficiency of resources and the possible need for additional resources.
- Keep in contact with the NAMIRG OC, at intervals of not more than 20 minutes
- Utilise the vessel's crew
 - Expertise
 - Local knowledge

4. Completion of operation

- Once the mission is completed:
 - Ensure that equipment and tools provided by the vessel are returned (e.g. radios, Fire/Safety Plans, etc.)
 - Ensure that everyone leaves the distress vessel safely
 - Organise post-mission maintenance/activities













NAMIRG SOP 6 - NAMIRG CREW MEMBER (FIREFIGHTER (FF))

PURPOSE

The purpose of this SOP is to describe the key tasks and responsibilities of a NAMIRG Crew Member during the different phases of an operation.

ROLE OF THE NAMIRG CREW MEMBER

The NAMIRG Crew Member works under the NAMIRG Group Leader and he/she is a member of the NAMIRG team.

The NAMIRG Crew Member performs all tasks given by the NAMIRG GL. Actively reports on the progress of the mission, and immediately reports on any changes in risks or other factors.

DEPLOYMENT OF THE NAMIRG Crew Member

1. Actions in a mobilisation phase

After receiving the mission, the NAMIRG Crew Member obtains preliminary information about the situation from the NAMIRG OC/GL, and then he/she prepares personal basic equipment in accordance with the separate checklist for helicopter (or support vessel) embarkation.

2. Actions on arrival at the distress vessel

The Crew Member takes note of the conditions on the vessel's deck, conducts a controlled transfer of equipment and, if necessary, mooring it to the landing site. Establishes an evacuation/rest/fire station point in a place where both crew and equipment is protected, following NAMIRG GL instructions.

Establishes a transit line system, following GL instructions:

- Green: Embarkation Point to Fire Station
- Blue: Fire Station to Command Point
- Red: Fire Station to Scene of Operations
- Yellow: Fire Station to Evacuation Point

3. Ongoing actions

The firefighter obeys the NAMIRG GL's instructions in order to perform the mission safely and effectively.

4. Completion of operation

The firefighter returns to the vessel's crew all the equipment and tools provided by the vessel (e.g. radios, Fire/Safety Plans, etc.)













CHECKLIST OF NAMIRG SOP 6 - NAMIRG CREW MEMBER (FIREFIGHTER (FF))

1. Actions in a mobilisation phase

- Go through the preliminary information with the NAMIRG OC/GL
- Gather and pack personal basic equipment in accordance with the separate checklist
- Everything that is brought along should be weighed (crew + gear = team weight).
 - Notify the NAMIRG OC of the actual weights
- Familiarise him/herself with communications
- Transfer to DV
- If necessary, use the flight-time to rehydrate/re-energise

2. Actions on arrival at the distress vessel

- Take note of the conditions on the vessel's deck.
- Conduct a controlled transfer of equipment, transfer it to safety and, if necessary, mooring it to the landing site. In demanding conditions, considers potential solutions with the NAMIRG OC/GL whilst still in air.
- Establish an evacuation/rest/fire station point in a place where both crew and equipment is protected, following NAMIRG GL instructions.
- Establishes a transit line system, following NAMIRG GL instructions:
 - Green: Embarkation Point to Fire Station
 - Blue: Fire Station to Command Point
 - Red: Fire Station to Scene of Operations
 - Yellow: Fire Station to Evacuation Point

3. Ongoing actions

• Obey the NAMIRG GL's instructions in order to perform the mission safely and effectively

4. Completion of operation

• Return to the vessel's crew all the equipment and tools provided by the vessel (e.g. radios, Fire/Safety Plans, etc.)













PURPOSE

The purpose of this SOP is to help all those participating in rescue operations to understand the general principles of communications. Organising effective communications between the MRCC/MRSC, distress vessel (DV) and rescue units is an integral part of rescue operations, and is the responsibility of the SAR authority (MRCC/MRSC) coordinating the situation.

RESPONSIBILITY AREAS AND TASKS

MRCC/MRSC drafts a communications diagram for the incident in question and states which communications channels are to be used.

In communications during a NAMIRG operation, it must be ensured that all rescue operation-related communications from the incident area go through the coordinating MRCC/MRSC before being relayed to other actors. The rescue units must not bypass the MRCC/MRSC when reporting on their operations; otherwise, the MRCC/MRSC's coordination-related situational awareness and decision-making may be based on incomplete information. Other authorities may turn to the MRCC/MRSC for information about the current situation or they might station a representative of their own at the MRCC/MRSC to maintain contact with their organisation.

The exception to this is the distress vessel communications with its own shipping company, commercial tugs, interest organisations (e.g. insurance company) or experts. If these communications shed light on information that has a bearing on the rescue operations or people's safety, the master of the vessel is obligated to inform the MRCC/MRSC about them.

COMMUNICATIONS TOOLS

During the alert phase, communications will be made using the most appropriate means available, via e-mail, telephone, radio, etc.

The receipt of communications via e-mail must always be confirmed.

The vessel's primary means of communications is Maritime VHF. In addition, contact with the vessel can be maintained with MF-HF radio, satellite phone, GSM or Inmarsat C.

In long-distance communications, such as when outside the range of VHF, it may be necessary to use MF-HF frequencies or air/surface craft to relay communications.

The main communications tools used by the MRCC/MRSC and rescue units are Maritime VHF radios, GSM, satellite phones and other technical devices that are













suitable for transmitting situation reports and electronic messages (email, certain surveillance devices, fax, etc.).

If the distress vessel is located far away, the external help/NAMIRG Operations Commander, may have to rely on the vessel's communications equipment to maintain contact with land. In such cases, communications from the vessel are carried out under the supervision and with the support of the vessel's own crew.

Communications between the NAMIRG team and the helicopter will be maintained through marine VHF radios.

NAMIRG teams/external rescue units on board the vessel (principally) use their own communications devices (VHF, UHF).

If communications on board the distress vessel are prevented for structural or other reasons, the crew should reserve communications equipment for the NAMIRG teams insofar as this is possible.

Even though the NAMIRG OC (Operations Commander) also communicates situation updates from the vessel to the MRCC/MRSC to the extent necessary, the master of the distress vessel has the actual responsibility for communicating information from the distress vessel to the MRCC/MRSC.











CHECKLIST NAMIRG SOP 7 – COMMUNICATIONS



1. Actions in a mobilisation phase

- Take the requisite communication devices on the mission
 - FRS radio
 - Maritime VHF
 - GSM
 - SATPHONE (if possible)
- Test the systems
- Ask for radio work channel (MRCC/MRSC)

2. Actions on arrival at the distress vessel

When the NAMIRG team is on board the DV, communications between the NAMIRG OC and the MRCC/MRSC (SMC/FLO) will take place primarily with marine VHF radios, using established channels and communicated to all participants in the rescue operations, from MRCC/MRSC.

Marine VHF radios will also be used to communicate with the OSC, if activated, and with other rescue operators in the area of operations.

The communications between NAMIRG OC and GL and the other firefighters will take place with the fire and rescue service radio. The NAMIRG GL and at least one firefighter for each team (of 2 operators) involved in the operations, will be equipped with a marine VHF radio, to be used for listening, in case communications concerning the safety of operations or of the ship are transmitted.

If communications on board the distress vessel are prevented for structural or other reasons, the crew should reserve communications equipment for the NAMIRG teams insofar as this is possible.

In case of need, for communications between the OC and the GL, the fixed communication systems of the ship (intercoms, loudspeakers, etc.) can be used.

3. Ongoing actions

• Keep in contact, at intervals of not more than 20 minutes, MRCC/MRSC and FLO with NAMIRG CO and NAMIRG CO with NAMIRG GL.













PURPOSE

The purpose of this SOP is to give to the NAMIRG team the procedures for helicopter transport. This SOP is necessary for safe and controlled operations, in line with flight regulations, and also to control emergency situations.

RESPONSIBILITY AREAS AND TASKS

The pilot of the helicopter leads all operations.

All those participating in maritime search and rescue tasks must wear a rescue suit throughout the helicopter flight.

Any equipment must be packed in the appropriate lockers/bags, and every lockers should be properly closed, while every bags should be properly fixed, as indicated by the helicopter crew.

The helicopter's crew is responsible for packing the helicopter's equipment.

The NAMIRG OC or GL should be aware of the total weight of the team and its equipment. All gear, persons, and personal equipment must be weighted before take-off, and the pilot of the aircraft must be notified of the combined weight to an accuracy of 5 kg, preferably as soon as the information is available, but at the latest on arrival at the aircraft. A helicopter's load capacity varies according to weather conditions and the planned route.

The helicopter's crew determine where rescue personnel will sit in the helicopter; rescue personnel maintains seatbelts fastened at all times.

The NAMIRG OC asks the helicopter's crew whether headsets are available for listening to radio traffic.

NAMIRG Team operators must obey all orders given by the helicopter crew.

Remember to bring anti-emetics and a plastic bag or similar handy in case of nausea.

The crew of the distress vessel must perform certain actions before helicopter can approach it for starting winching operations.















CHECKLIST NAMIRG SOP 8 - OPERATIONS WITH HELICOPTER

1. Actions in a mobilisation phase

- The pilot of the helicopter leads all operations.
- All those participating in maritime search and rescue tasks must wear a rescue suit throughout the helicopter flight (MANUAL lifejacket, PLB, EBS).
- By default, communications devices should be switched off during the flight. NAMIRG OC and the pilot of an aircraft can agree otherwise if necessary.
- Any team equipment must be packed in the appropriate lockers/bags.
 - When packing these lockers, the lids must be closed and securely latched, and the bags must be securely fixed.
- The helicopter's crew is responsible for packing the helicopter's equipment.
- The NAMIRG OC or GL should be aware of the total weight of the team and its equipment. All gear, persons, and personal equipment must be weighted before take-off, and the pilot of the aircraft must be notified of the combined weight to an accuracy of 5 kg, preferably as soon as the information is available, but at the latest on arrival at the aircraft.
- A helicopter's load capacity varies according to weather conditions and the planned route.
- The helicopter's crew determine where rescue personnel will sit in the helicopter.
- Seatbelts must be worn at all times.
- The NAMIRG OC is always the last to board the helicopter (first out).
- Ask the helicopter's crew whether headsets are available for listening to radio traffic.
- Team members must obey all orders given by the helicopter crew.
- It is worth keeping a plastic bag or similar handy in case of nausea. (Remember antiemetics!)

2. Actions on arrival at the distress vessel

- The pilot of the helicopter is responsible for both the transfer and the safety of the operation, and he will decide on whether any personnel will be winched to the target.
- The helicopter crew's surface rescuer is always the first person to be winched to the target (if he/she is present), then NAMIRG OC, NAMIRG GL, then the rest of the team.
- No one must touch the winch cable before it has touched either the vessel's deck or the ground. (Be aware: static electricity; take note when reaching for the cable).
- The NAMIRG OC is the last to board the helicopter when leaving the target.
- If a NAMIRG OC asks to be winched (to the vessel), he/she should note that the distress vessel must perform certain actions before the helicopter can approach it:













- All those involved in the operations must use clearly distinguishable protective clothing or vests, and helmets.
- Anyone who is not taking part in the operations should move away from the winching zone, and all unnecessary equipment should be moved out of the way
- Any rotating antenna, rigging or the suchlike near the winching zone should be appropriately secured.
- Firefighting equipment must be kept ready for use (vessel firefighting team).
- The person meeting the helicopter must be ready to give hand signals to the pilot.
- The standby boat must be ready for use, likewise lifesaving equipment.
- When lighting the winching zone in the dark, the lights must not blind the helicopter pilot.





NAMIRG SOP 9 - OPERATIONS FROM A VESSEL

PURPOSE

The purpose of this SOP is to give to the NAMIRG team the procedures for a safe transfer to the Distress Vessel from a support vessel, which can be used to travel to the scene of an accident if there are special grounds for doing so.

RESPONSIBILITY AREAS AND TASKS

Transferring to the Distress Vessel using a support vessel may be extremely slow, difficult and dangerous. When the options have been identified, the total time required for the transfer must first be estimated, and thereby the appropriateness and viability of the operation.

The master of the support vessel is responsible for both the transfer and the safety of the operation, and he will decide on whether any personnel will be transferred to the target.

There is the necessity to consider the safety of the NAMIRG team when operating out of a boat, and that in certain conditions the ship-to-ship transfer could be impossible.

Remember to bring anti-emetics and a plastic bag or similar handy in case of nausea Transfer to the Distress Vessel mainly occurs through the pilot hatch/embarkation station

Equipment should primarily be transferred to the distress vessel using cranes and other aids, in small and light units.

If the distress vessel is to be boarded using a pilot ladder, the first NAMIRG person across should climb the ladder and arrange a safety rope to secure all other members of the team, that should always attach their harnesses to the safety rope as they climb up to the deck.

















1. Actions in a mobilisation phase

- Consider the safety of the NAMIRG team when operating out of a boat
 - Standard flight equipment (Remember PLB), AUTOMATIC life jacket
 - Helmet
 - Movement on deck
- Pack equipment in sturdy boxes
- Secure equipment to prevent it from moving
- It is worth keeping a plastic bag or similar handy in case of nausea. (Remember antiemetics!)

2. Actions on arrival at the distress vessel

- The master of the support vessel is responsible for both the transfer and the safety of the operation, and he will decide on whether any personnel will be transferred to the target.
- Note that a small boat next to a larger ship will not move in sync with the larger vessel.
- In certain conditions the ship-to-ship transfer could be impossible
- Transfer to the Distress Vessel mainly occurs through the pilot hatch/embarkation station
- Pay attention to the following when transferring to the Distress Vessel:
 - One person at a time, without personal equipment bags or other equipment
 - Protective gear must be used at all times
 - Equipment should primarily be transferred to the distress vessel using cranes and other aids, in small and light units.
 - If the distress vessel is to be boarded using a pilot ladder, the first NAMIRG person across should climb the ladder and arrange a safety rope to secure all other members of the team, that should always attach their harnesses to the safety rope as they climb up to the deck.













PURPOSE

The purpose of this SOP is to support decision making and managing firefighting efforts on board a distress vessel.

NAMIRG Team supports the vessel's crew in its firefighting operations and the primary focus should be to prevent the need for evacuation of vessel and save lives. Rescuing property and preventing any threats of environmental damage is a secondary task.

CHECKLIST NAMIRG SOP 10 – VESSEL FIRE

- Obtain information about the target area from the Safety/Fire Plan:
 - water supply
 - water extraction
 - access routes
 - smoke extraction
 - dangerous substances
 - watertight doors, etc.
- Define the best possible attack route to the target.
- If possible, attempt to approach the target from below.
- If possible, turn off ventilation systems, so that the fire/smoke does not spread.
- Larger vessels will have automatic fire doors between sections.
- Ship fires are usually extinguished by limiting oxygen, that is, by 'sealing' areas with, for example, watertight doors.
- Ensure that there is enough hose (working allowance) for a two-person smoke diving team and a two-person safety team.
- Test radio contact before commencing smoke diving.
- Once the operation has started, maintain continual radio contact between the smoke diving team and the smoke zone, so that, if necessary, messages can be relayed between the smoke divers and the smoke diving supervisors (NAMIRG GL). There must be continual contact between the smoke diving supervisor and the NAMIRG OC.
- Use a safety leash when working in smoke-filled areas.
- Make sure that there is a safety diver team and a smoke diving supervision.
- The safety team can check upper areas or other areas during smoke diving, but the safety team must be able to respond within one minute.
- If there is only one NAMIRG team at the target, the following things should be noted:
 - The safety team must be rested (a pair that has just returned from smoke diving cannot immediately act as a safety team).
 - Ensure that smoke diving teams can rest for the required period.













- Use snap lights to show routes that have already been taken (when possible).
- Mark searched cabins with Triage pen by drawing a cross above the door handle.
- Pre-empt the fire spreading to upper areas.





