

# **Bulk Carrier VIMC SUNRISE Major Marine Occurrence**

## **Executive Summary**

On October 17, 2022, a Vietnam-flagged bulk carrier named VIMC SUNRISE, owned by Vietnam Maritime Corporation with IMO No. 9331878 and a gross tonnage of 31236, carried on 22 crew members on board, including a captain. At 0017 hours (Taiwan local time), VIMC SUNRISE was sailing northward through the Taiwan Strait and entered the southern reporting line of the Changhua Wind Farm Channel. However, at 1101 hours, due to the influence of the northeast monsoon, the ship was unable to continue sailing northward, resulting in its position drifting southeast.

At 1626 hours, the captain informed the Changhua VTS officer via VHF radio that the anchor would be dropped at 23 degrees 49.9 minutes north latitude and 120 degrees 04.5 minutes east longitude. At 1635 hours, the captain assigned the chief mate, bosun, and two sailors to wear life jackets and safety helmets, and carry personal safety ropes to the bow of the ship for anchoring operations. At around 1650 hours, approximately 7 miles west of Mailiao Township, Yunlin County, the four crew members went to the deck to prepare for anchoring. Due to the severe weather conditions, the chief mate fell into the sea and went missing, while three crew members sustained injuries. Additionally, several injuries occurred on the main deck of the ship.

In accordance with the Taiwan's Transportation Occurrence Investigation Act and the Casualty Investigation Code of the International Maritime Organization, the TTSB is an independent transportation occurrence investigation agency responsible for conducting this investigation. The investigation team also included members from the Maritime Port Bureau of the Ministry of

Transportation and Communications, Taiwan International Ports Corporation, Ltd., Coast Guard Administration, Ocean Affairs Council, and VIMC Shipping Company.

After comprehensive investigation and analysis of the factual data, a total of 9 findings and 2 safety recommendations were obtained.

**The findings related to probable causes are as follows:**

1. On the day of the occurrence, the Beaufort scale increased from 9 to 11, the wave height increased from 5.2 to 6.2 meters, and the forecastle and main deck of VIMC SUNRISE continued to surf, sailing speed was lower than 1 knot, and the captain still insisted on sailing to north bond, which made he difficult to control the ship. At about 1150 hours, when the engine power of ship was no longer able to resist the wind and waves and stabilize the ship's position, the captain did not change the course in time, and sailed the ship to a safe water area to avoid heavy weather conditions, which caused the ship sailing to a risk of being grounded.
2. Under heavy weather conditions, the captain of VIMC SUNRISE was not vigilant enough, he did not comply with the risk assessment procedure, did not actually perform additional risk measures for anchoring operations, and rashly dispatched four crew members to the forecastle to perform anchoring operation.
3. Four crew members were hit by strong winds and huge waves when they went to the forecastle to perform anchoring operations, causing two crew to fall into the sea, and the other two crew seriously injured. After the bow of the ship was hit by waves several times, the unconscious chief officer and AB no. 1 fell into the sea, and AB no. 2 was hit by waves, resulting in a concussion and fractures of the right tibia and fibula.

**The findings related to risk are as follows:**

1. The VIMC SUNRISE was affected by a heavy weather, causing the main engine to activate the protection mechanism and reduce its load. As a result, the speed of the engine was reduced and the rudder efficiency was compromised, making the captain impossible to control the ship and sail north bond.
2. From October 16 to 18, 2011, the Taiwan Strait experienced the combined effect of the northeast monsoon and the water vapor surrounding the mild typhoon "NISA". This resulted in a strong northeast monsoon and heavy rain, making it unfavorable for ships to sail at sea.

**The other findings are as follows:**

1. The main engine, auxiliary engine, navigation instruments, and survival equipment of VIMC SUNRISE are operating normally.
2. During the first wave surfing, the first mate's personal safety belt may not be fastened tightly to the railing in the operating area.
3. The captain and crew members of VIMC SUNRISE hold valid certificates of competency issued by the competent authority, and the rest hours and activities before the occurrence were normal.
4. At the time of the occurrence, several cargo ships had changed their passage plans in the channel waters of Changguan Wind Farm, and chose to anchor outside the port of Mailiao or sail to south bond.

**Safety Recommendations**

**To VIMC Shipping Company**

1. Fulfill the safety management system (SMS) and conduct an extraordinary internal audit, especially for the ship side of VIMC SUNRISE, to ensure that

SMS is being properly implemented by the crew.

2. Strengthen crew safety education and training, with emphasis on personal safety protection for the crew, identification of onboard operation risks, and implementation of preventive measures. Additionally, crew members should avoid working on the main deck and forecastle during heavy weather conditions to prevent crew injuries and man overboard incidents.

**Note:** The final report of this occurrence investigation is published in Chinese. To facilitate understanding for non-Chinese readers, the Executive Summary has been translated into English. While every effort has been made to ensure accuracy, discrepancies may occur. In the event of any inconsistency, the Chinese version shall prevail.