

IDWAL



DESKTOP ANALYSIS
REPORT

EXAMPLE VESSEL

IMO Number: 1234567
20th March 2019



PREAMBLE

The data used for this analysis is from publicly available sources, paid-subscription services, Class reports and from reports provided by the client. The final evaluation should be used for guidance only. Confirmation of first-hand data, facts and condition should always be supported by inspecting at least a sample of vessels in each class, plus any sister ships that give any concern.

This desktop report is intended for the sole use of the recipient and its purpose is to offer a remote-evaluation of the asset(s), inclusive of several assumptions, and has been issued prior to the conclusions of any physical inspections having been considered. The results are objectively determined, and the depth of the findings is in all respects limited to the quantity and quality of the data-set provided.

All details are given in good faith, and without guarantee.

This report has been prepared and issued by Idwal Marine Services Ltd to its Customer in accordance with the General Terms and Conditions of Idwal Marine Services Ltd, a copy of which can be obtained at www.idwalmarine.com.

REFERENCES

1. Online Public Information: Equasis, Paris MOU, Managers and Shipyard Websites.
2. Subscription based Intelligence.
3. A recent Manager's inspection report from 22nd January 2019.
4. Class Status report issued on 17th March 2019.
5. NORDLION bridge and machinery equipment lists.

SUMMARY

The Example Vessel is a 4.5 year old, 1,700 TEU fully cellular, gearless container vessel. She was delivered in May 2014 and is due for her 1st special survey and dry docking in May 2019.

The vessel has had the same owner since new build and has been operated by three different companies. The vessel is currently under the Cypriot flag but has had 1 flag change since new build, previously being German flagged. However, the vessel has remained with class DNV-GL since being built in 2014. The vessel has had only two vessel managers over her life which shows a good continuity of vessel management.

The vessel manager's recent vessel inspection report from 22nd January 2019 along with the vessel equipment list and Class status report from 17th March 2019 were provided for review. The vessel manager report was limited in its scope and did not provide pictures of the vessel or in-depth detail regarding the various defects and deficiencies. Due to the provided data being very limited in its detail and scope a true assessment of the vessel condition is difficult and a visual inspection of the vessel is highly recommended.

From the limited documentation supplied, the vessel appears to be in relatively good overall condition but with several deficiencies. The most notable of which was that the main engine thrust bearing was reported to be sustaining repetitive damage, there was an issue with one main engine cylinder gasket, the steering gear was reported to be in poor condition with no further information provided and the cargo holds were reported to be in average condition with spot corrosion on the tank tops and side plating along with damage to the ventilation trunking.

Review of the Class records was not possible due to access not being provided. However, from review of the Class status report issued in March 2019, the vessel was seen to be free from any Conditions of Class (CoC), memos, observations or notes regarding required statutory upgrades.

The Port State Control (PSC) history of the vessel

was found to be good with no deficiencies and no detentions recorded in the 3 inspections carried out over the previous three years. The vessel has been trading in South East Asia over the previous 12 months in countries such as Vietnam, Thailand, China and South Korea.

Given the good condition of the vessel it is estimated that the OPEX levels are likely to be as per industry norms for vessels of a similar type, size and age.

Future CAPEX requirements include the 1st Special Survey docking due by 13th May 2019 at an estimated cost of USD 400,000.

PARTICULARS

Name	Example Vessel
IMO Number/Call sign	1234567 / A1D2C3
Vessel Type	Fully cellular gearless container vessel
Age/built/Shipbuilder	4.5 years / 14th May 2014 / Example Shipbuilder
Flag/ Class	Cyprus / DNV-GL
Registered Owners/Managers /Charterer	Example Owner / Example Charterer Example Operator
Survey Status	Last drydocked (never); 1st Special Survey due by 13th May 2019
Crew	Information not provided
Ballast Water Treatment System	Information not provided (Ballast Water Management Certificate states that the treatment method is via exchange)
ECDIS	2 x TRANSAS NAVIPILOT 4000
Speed and Consumption (*)	Service speed: 18.5 knots @ 45 t/24 hrs (As per sea trials)
Dimensions	LOA 169.95 m / Beam 28.1 m / depth 14.2 m / draft 9.5 m
Tonnage	23,574 DWT / GRT – 18,826 t / Lightship – 8,615 t
Cargo Layout	The vessel is a fully cellular, gearless container vessel with a capacity of 1,700 TEU with 350 reefer capacity. All holds/bays are located forward of the accommodation.
Machinery	Main Engine – Doosan MAN B&W 6S60ME-B8, 12,200 kW @ 100 rpm. Auxiliary Engines – 2 x Zhengjiang CME MAN 8L21/31, 1,760 kW @ 900 rpm (Tier II). 1 x Zhengjiang CME MAN 6L21/31, 1,320 kW @ 900 rpm (Tier II).

DESIGN AND CONDITION

The vessel is a 1,700 TEU gearless, fully-cellular container vessel, with the ability to carry 350 reefer containers. She is not strengthened for the carriage of heavy cargo and has no ice class notations. She is fitted with one 6-cylinder Doosan MAN B&W main engine with an MCR of 12,400kW with a service speed stated at 18.5 knots, three auxiliary engines are also installed but with no shaft generator.

From review of the vessel manager inspection report conducted between 21st and 22nd January 2019 the vessel's hull is stated as being in average condition which is to be expected considering the vessel has been in-water for nearly 5 years with her first dry docking for her 1st special survey due by 13th May 2019.

Both the forecastle and windlass are stated as being in average condition with a remark stating that the guarantee claim is to be issued for the windlass but with no further details. On the action list it also states that several chain links on the starboard anchor chain need to be welded. The poop and main deck are stated as being in good condition.

The bridge and navigation equipment is reported to be in good condition but with the Bridge navigation Watch Alarm System (BNWAS) software needing to be upgraded and one antenna cable gland and grounding cable that needs to be inspected and repaired.

The accommodation and galley were also stated as being in good condition but with the external accommodation reported to require maintenance on both sides, the aft part and around port holes, which is likely due to corrosion but this cannot be confirmed without inspecting the vessel. A separate report regarding the accommodation is mentioned in the inspection report and is recommended to be acquired from the vessel manager.

The engine room general appearance was reported as being in average condition, with the condition of the tank tops and bilges reported to require maintenance. All main machinery were reported to be within their overhaul/service intervals, however repeated damage to the main engine thrust bearing was reported, with the ship manager stating that the engine manufacturer is required to be

consulted to ascertain the reason for this repetitive damage. An issue with a main engine cylinder liner gasket is also briefly mentioned stating that it may be able to be ground down by the vessel crew. The steering gear was stated as being in poor condition with an action plan yet to be approved by the vessel manager, however no further information was provided regarding the steering gear apart from the need to cut inspection gaps in the steering gear hydraulic pumps in order to check the condition of the flexible couplings. The stern tube arrangement is also reported to be in poor condition but with a retrofit stated as being required, this may be just to upgrade the stern tube to be VGP compliant for trading to the USA.

The fire dampers were stated as being in poor condition with greasing points needing to be installed, it is likely that the fire dampers have seized due to lack of lubrication. The free fall lifeboats were reported to be in good condition but with the windows needing to be replaced.

In the vessel manager inspection reports, the cargo holds are stated as being in average condition with spot corrosion on the tank tops and hold sides, with the corrosion reported as becoming more established since the last inspection. Cargo hold no.3 was reported to be the worst affected hold. It is likely that water blasting and re-coating of the holds is required however this cannot be confirmed without inspecting the vessel. Cargo hold ventilation trunks are also reported to be damaged at the ends and are required to be repaired, as are all air outlets from the cargo hold ventilation trunks. Hatch cover rubber seals and mechanical parts are stated as being in average condition with a remark stating that work is to be carried out on them during dry docking. It is likely that the rubber seals need to be replaced due to over compression or damage, but this cannot be confirmed.

A dry dock scope and repair list was reported to have been created and reviewed by the vessel manager which shows that the vessel managers are aware of the maintenance that is required to be carried out during dry docking and that action is being taken.

CONSTRUCTION

The vessel was built at Example Shipbuilder China to good specifications in 2014. According to the ship manager inspection report the vessel has corrosion on the cargo hold tank tops where maintenance is difficult to conduct but with no significant structural damage or defects reported. The vessel has no memos or conditions of class indicating that the vessel is constructed to a good standard. The engine room

machinery is provided by a combination of well-known European and far Eastern manufacturers who have good global servicing and maintenance capabilities. This specific yard is one of the largest private shipyards and has only been operating since 2006 and has a capacity of 100,000 GT. Since opening the yard has built a total of 152 vessels, focusing on Smaller container vessels, medium sized bulk carriers and multi-purpose vessels.

CLASSIFICATION

Please note a full classification record review has not been undertaken since the access was not available.

Vessel carries the following basic class notations:

100 A5 Container ship BWM (D1) D, ERS, IW, NAV-O

+MC AUT, CM-PS, EP-D

There is no Ice Class notation.

There is no Ice Class notation but the vessel has the class notation CM-PS indicating that she is allowed to

enter the extended Dry Docking (EDD) scheme and also EP-D which is a voluntary class notation assigned at newbuild indicating that the vessel exceeded compliance with various environmental regulations and requirements at the time of newbuild.

There were no Conditions of Class (CoC) or Observations contained within the Class status report, and no memos or notes regarding the phase in of regulations.

No Inventory of Hazardous Materials or Green Passport was shown in the class status report.

CAPEX/OPEX PROJECTIONS

Dry Dockings

The next dry docking for the 1st special survey in May 2019 is estimated at USD 400,000 based on a Far Eastern shipyard and includes all survey and normal maintenance costs. It excludes owners upgrades and statutory compliance costs such as the installation of ballast water treatment system.

Ballast Water Treatment System (BWT) Retrofit

No information regarding BWTS was provided, however it is very likely that no BWTS is installed with the Ballast Water Management Certificate (BWMC) stating that the treatment method is via exchange and the vessel having a 'D1' Class notation. If the vessel does not have a BWTS installed then it will not be required to be installed until the vessel's 2nd IOPP renewal survey in 2024.

Intermediate drydocking

None if the in-water survey notation is not omitted (unlikely).

ECDIS

None required until 17.5 years old.

ECA Zone/Low Sulphur Fuel/Global 2020 Sulphur Cap

A TRANSIS NAVIPILOT 4000 is stated as being installed on board in the vessel's equipment list provided and is also listed as the back-up arrangement. However, this cannot be confirmed unless the Safety Equipment Certificate (SEC) Part E is sighted.

CAPEX/OPEX PROJECTIONS CONTINUED

US EPA Vessel General Permit Compliance (VGP)

The next dry docking for the 1st special survey in May 2019 is estimated at USD 400,000 based on a Far Eastern shipyard and includes all survey and normal maintenance costs. It excludes owners upgrades and statutory compliance costs such as the installation of ballast water treatment system.

Ballast Water Treatment System (BWT) Retrofit

There was no evidence provided stating that the vessel's stern tube is VGP compliant for trading to the United States. In the vessel manager report, it states that a retrofit is to be conducted in the shipyard which may be to install an air seal or to fit Environmentally Friendly Lubricants (EAL) to assist the vessel in becoming VGP compliant. However, this should be confirmed with the vessel manager. If the vessel wishes to trade to the USA, various upgraded and modifications will have to be conducted.

Projects/Upgrades

No information provided.

OPEX











The estimated OPEX would be around 5,100 USD/Day. Managers have not supplied any financial data.

TRADING

The vessel has traded in the following locations over the last 12 months, mainly around South East Asia:

South Korea
Thailand
China
Vietnam

RECOMMENDATIONS

Item	Action
 Repeated damage to the main engine thrust bearing was reported	The ship manger stated that the engine manufacturer is required to be consulted to ascertain the reason for the repetitive damage
 An issue with a main engine cylinder liner gasket is briefly mentioned stating that it may be able to be ground down by the vessel crew.	More information regarding this issue is to be requested from the vessel manager.
 The steering gear was stated as being in poor condition with an action plan yet to be approved by the vessel manager.	The reason for stating that the steering gear was in poor condition is to be ascertained.
 The cargo holds were stated as being in average condition with spot corrosion on the tank tops and hold sides, with the corrosion reported as becoming more established since the last	It is likely that water blasting and re-coating of the holds is required however this cannot be confirmed without in-specting the vessel.
 Cargo hold ventilation trunk ends and air outlets were reported to be damaged.	Ventilation trunks to be repaired.
 No inventory of hazardous materials.	Shall be required by December 2020 for EU port entry.
 No BWTS is installed on board.	BWTS will not be required to be installed until the 2nd IOPP renewal survey in 2024.
 Several chain links on the starboard anchor chain need to be welded.	Welding to be carried out during dry docking and to be inspected by class.
 One antenna cable gland and grounding cable that needs to be inspected and repaired.	To be repaired by vessel crew.
 The external accommodation was re-ported to require maintenance. A separate report regarding the accommodation is mentioned in the inspection report.	Separate report is recommended to be acquired form the vessel manager.