

COPY.

Lloyd's Register of Shipping.



Port **DAIREN** No. 4878 (a)

February 1st, 1934.

This is to Certify that

John Sim

the undersigned Surveyor to this Society did at the request of

Messrs. Cornabe, Bekford & Winning, Lloyd's Agents at Dairen, on behalf of Messrs. East Asiatic Co., Dairen, attend on board the S/S "KAKO MARU" of Tokio, on Jan. 30th/31st, as she lay at the Jijiko Pier also visited the South Manchuria Railway Co.'s storage tanks for the purpose of measuring shipment of Bean Oil to be loaded into the Starboard After Deep Tank and reporting on the capacity and safe stowage of same in bulk for Europe.

The measurements taken at the S.M.R.Co.'s storage tank No.1 and measured before loading 5.172 metres equals 942.674 cub metres F.W. with oil temp 8.3°C and density .9284 i.e. $942.674 \times .9284$ equals 875.178 cub metres oil in tank. Remaining in tank 3.377 metres equals 615.153 metres F.W. with oil temp 9.0°C and density .9279 i.e. $615.153 \times .9279$ equals 570.800 cub metres oil in tank. Therefore 875.178 minus 570.800 equals 304.378 cub metres from tank.

Measurements taken at the S.M.R.Co.'s storage tank No.1 and measured before loading 1.210 metres equals 219.921 cub metres F.W. with oil temp 7.4°C and density .929 i.e. $219.921 \times .929$ equals 204.306 cub metres oil in tank. Remaining in tank after loading .722 metres equals 130.747 cub metres F.W. with oil temp 5.7°C and density .9302 i.e. $130.747 \times .9302$ equals 121.620 cub metres oil. Therefore 204.306 minus 121.620 equals 82.686 cub metres plus 1st lot 304.378 equals 387.064 divided by 1.016 equals 380.968 tons oil from tank less .568 for flexible hose making total into ship's tank 380.4 long tons (Three hundred and eighty decimal four long tons) shipped.

Ullage measurements taken 19 hours after loading had been completed with Draft Fore 9'-7" Draft Aft 18'-5" list 1° to Port Mean temp 6.6°C Density .9296 Sea-temp + 1.2°C Air temp + 1.2°C

17 1/2" 17" : Sufficient allowance has been made for expansion during present voyage to Europe.

16 1/2" 16 1/2" : I hereby certify that all the above measurements together with temp and density were taken by the undersigned and show the amount of Bean Oil loaded into the Starboard After Deep Tank of the steamer "KAKO MARU" of Tokio, on January 30th, 1934.

This Certificate is issued upon the terms of the Rules and Regulations of the Society, which provide that:-

"While the Committee use their best endeavours to ensure that the functions of the Society are properly executed, it is to be understood that neither the Committee nor the Society are under any circumstances whatever to be held responsible for any inaccuracy in any report or certificate issued by the Society or its Surveyors, or in any entry in the Register Book or other publication of the Society, or for any error of judgment, default, or negligence of the Committee or any Member thereof, or the Surveyors, or other Officers or Agents of the Society."