



Confirmation of Product Type Approval

Company Name: DOVER PUMPS & PROCESS SOLUTIONS SEGMENT, INC. DBA BLACKMER

Address: 1809 CENTURY AVE SW GRAND RAPIDS MI 49503 United States

Product: Pump

Model(s): Magnes 3" to 4" Series, MI3, MI4, MS3 and MS4, Sliding Vane Magnetic Drive Pumps

Endorsements:

Certificate Type	Certificate Number	Issue Date	Expiry Date
Product Design Assessment (PDA)	23-2343226-PDA	24-JAN-2023	23-JAN-2028
Manufacturing Assessment (MA)	25-7220534	08-OCT-2025	15-OCT-2030
Product Quality Assurance (PQA)	25-7220534-PQA	08-OCT-2025	15-OCT-2030

Tier

4 - Enrolled in PQA Program

Intended Service

Marine & Offshore Application - Transfer and Stripping Pumps for AFFF (Foam), Clean Distillate and Heavy Fuels, Lubes, Oil, and Dirty Distillate.

Description

Magnes Series MI3 and MI4 Sliding Vane Pumps constructed with Ductile Iron (ASTM 536, 18% Elongation), and Magnes Series MS3 and MS4 constructed with Stainless Steel (ASTM A351, Grade CF-8M) or Stainless Steel (ASTM A747 CB7-CU1, Grade H1150)

Ratings

a) Magnes 3" Series, MI3 and MS3

Maximum Working Pressure: 225 psi (15.5 bar)

Maximum Differential Pressure: 200 psi (13.8 bar)

Maximum Temperature: 250°F (121 °C) with FKM or PTFE O-rings

Performance Data, MAGNES 3": 74 to 260 GPM

Speed (RPM): 250 to 640 RPM

Power (HP): 3 to 40 HP

b) Magnes 4" Series, MI4 and MS4

Maximum Working Pressure: 225 psi (15.5 bar)

Maximum Differential Pressure: 200 psi (13.8 bar)

Maximum Temperature: 250°F (121 °C) with FKM or PTFE O-rings

Performance Data, MAGNES 4": 200 to 520 GPM

Speed (RPM): 250 to 520 RPM

Power (HP): 3 to 75 HP

See "pdf" attachment for Performance Curves

Service Restrictions

Unit Certification is required for this product if the pumps are used for services listed in Marine Vessels Rules 4-6-1/7.3.1, hydrostatic and capacity testing is to be performed to the satisfaction of the Surveyor as indicated in Marine Vessels Rules 4-6-1/7.3.2 a), b).

If the manufacturer or purchaser request an ABS Certificate for compliance with a specification or standard, the specification or standard, including inspection standards and tolerances, must be clearly defined.

Comments

The Manufacturer has provided a declaration about the control of, or the lack of Asbestos in this product.

Notes, Drawings and Documentation

Drawing No. 110-001, Brochure Blackmer MAGNES Series Magnetic Drive Pump, Revision: A, Pages: 1

Drawing No. 110-025, Curves Blackmer MAGNES Series 3" Magnetic Drive Pumps, Revision: A, Pages: 1

Drawing No. 110-027, Curves MAGNES Series 4" Magnetic Drive Pumps, Revision: A, Pages: 1

Drawing No. 110-046, Parts List Blackmer MAGES Series Magnetic Drive Pump 3" Models, Revision: A, Pages: 1

Drawing No. 110-047, Parts List Blackmer MAGNES Magnetic Drive Pump 3" Standard Units, Revision: A, Pages: 1

Drawing No. 110-091, MOC Blackmer MAGNES Series Magnetic Drive Pump Model MI3, Revision: A, Pages: 1

Drawing No. 110-092, MOC Blackmer MAGNES Series Magnetic Drive Pump Model MS3, Revision: A, Pages: 1

Drawing No. 110-093, MOC Blackmer MAGNES Series Magnetic Drive Pump Model MI4, Revision: A, Pages: 1

Drawing No. 110-094, MOC Blackmer MAGNES Series Magnetic Drive Pump Model MS4, Revision: A, Pages: 1

Drawing No. 110-101, Dimensions Blackmer MAGNES Series 3" Magnetic Drive Pumps, Revision: A, Pages: 1

Drawing No. 110-103, Dimensions Blackmer MAGNES Series MI4 Magnetic Drive Pump, Revision: A, Pages: 1

Drawing No. 110-104, Dimensions Blackmer MAGNES Series MS4 Magnetic Drive Pump, Revision: A, Pages: 1

Drawing No. 110-A00, IOM Blackmer MAGNES Series Magnetic Drive Pumps, Revision: A, Pages: 1

Drawing No. 110-A01, Parts List MAGNES Series Magnetic Drive Pump 3" Models, Revision: A, Pages: 1

Drawing No. 110-a02, Parts List Blackmer Series Magnetic Drive Pumps 4" Models, Revision: A, Pages: 1

Term of Validity

This Product Design Assessment (PDA) Certificate remains valid until 23/Jan/2028 or until the Rules and/or Standards used in the assessment are revised or until there is a design modification warranting design reassessment (whichever occurs first).

Acceptance of product is limited to the "Intended Service" details prescribed in the certificate and as per applicable Rules and Standards.

This Certificate is valid for installation of the listed product on ABS units which exist or are under contract for construction on or previous to the effective date of the ABS Rules and standards applied at the time of PDA issuance. Use of the Product for non-ABS units is subject to agreement between the manufacturer and intended client.

ABS Rules

2023 Rules for Conditions of Classification; 1-1-4/7.7, 1-1-A3, 1-1-A4, which covers the followings;

2023 Rules for Building and Classing Marine Vessels: 4-6-1/7.3.1, 4-6-1/7.3.2

2023 Rules for Conditions of Classification - Offshore Units and Structures, 1-1- 4/9.7, 1-1-A2, 1-1-A3 which covers the following:

2023 Rules for Building and Classing Mobile Offshore Units: 4-2-2/3

International Standards

NA

EU-MED Standards

NA

National Standards

NA

Government Standards

NA

Other Standards

None



A handwritten signature in black ink, appearing to read "Joseph W. Wilson".

Corporate ABS Programs

American Bureau of Shipping
Print Date and Time: 06-Jan-2026 6:37

ABS has used due diligence in the preparation of this certificate, and it represents the information on the product in the ABS Records as of the date and time the certificate is printed.

If the Rules and/or standards used in the PDA evaluation are revised or if there is a design modification (whichever occurs first), a PDA revalidation may be necessary.

The continued validity of the MA is dependent on completion of satisfactory audits as required by the ABS Rules. The validity of both PDA and MA entitles the product to receive a **Confirmation of Product Type Approval**.

Acceptance of product is limited to the "Intended Service" details prescribed in the certificate and as per applicable Rules and Standards.

This Certificate is valid for installation of the listed product on ABS units which exist or are under contract for construction on or prior to the effective date of the ABS Rules and standards applied at the time of PDA issuance. ABS makes no representations regarding Type Approval of the Product for use on vessels, MODUs or facilities built after the date of the ABS Rules used for this evaluation.

Type Approval requires Drawing Assessment, Prototype Testing and assessment of the manufacturer's quality assurance and quality control arrangements. The manufacturer is responsible to maintain compliance with all specifications applicable to the product design assessment. Unless specifically indicated in the description of the product, certification under type approval does not waive requirements for witnessed inspection or additional survey for product use on a vessel, MODU or facility intended to be ABS classed or that is presently in class with ABS.

Due to wide variety of specifications used in the products ABS has evaluated for Type Approval, it is part of our contract that; whether the standard is an ABS Rule or a non-ABS Rule, the Client has full responsibility for continued compliance with the standard.

Questions regarding the validity of ABS Rules or the need for supplemental testing or inspection of such products should, in all cases, be addressed to ABS.