

Blancett®

FloClean™ Turbine Meter Repair Kit

**INSTALLATION & INSTRUCTION
MANUAL**



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NOTE: *Blancett reserves the right to make any changes or improvements to the product described in this manual at any time without notice.*

INTRODUCTION

The FloClean turbine flow meter is designed with wear resistant moving parts to provide trouble free operation and long service life per 3-A specifications. The kit allows easy field repair of a damaged flow meter, rather than replacing the entire flow meter. Repair parts are constructed of stainless steel alloy and tungsten carbide.

OPERATING PRINCIPLE

Fluid moving through the turbine flow meter causes the rotor to turn at a speed proportional to the flow rate. The rotor blade cuts the magnetic field of the magnetic pick-up, which in turn generates a frequency output signal that is directly proportional to the speed. The signal is used to represent flow rate and/or totalization of fluid passing through the turbine flow meter. See **Figure 1** for typical turbine meter assembly.

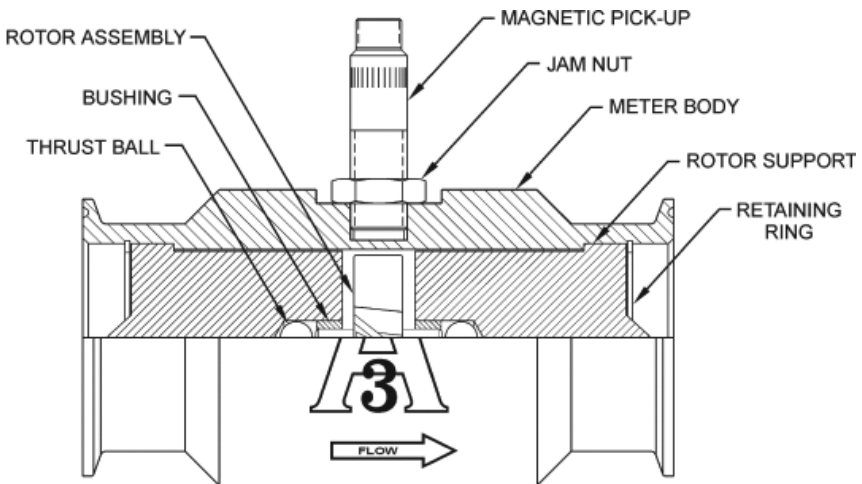


Figure 1
FloClean turbine flow meter

Each FloClean repair kit is factory calibrated to ensure accuracy throughout the entire flow range. Each kit is complete and includes a new K-factor, which is the calibrated number of pulses generated by each gallon of liquid. This K-factor will be used to recalibrate the monitor or other electronics to provide accurate output data.

PART INFORMATION

Ferrule Size	Part Number	Repair Kit Part Number
0.984"	B16A-003A-XXX	B16A-K03A
0.984"	B16A-005A-XXX	B16A-K05A
0.984"	B16A-007A-XXX	B16A-K07A
1.984"	B16A-105A-XXX	B16A-K05A
1.984"	B16A-107A-XXX	B16A-K07A
1.984"	B16A-108A-XXX	B16A-K08A
1.984"	B16A-110A-XXX	B16A-K10A
1.984"	B16A-115A-XXX	B16A-K15A
3.047"	B16A-220A-XXX	B16A-K20A

TURBINE METER REMOVAL

WARNING: High-pressure leaks are dangerous and cause personal injury. Make sure that fluid flow has been shut off and pressure in the line released before attempting to remove the meter.

DISASSEMBLY

Refer to **Figure 1** on page 3 for relative positions of repair kit components.

1. Remove the magnetic pick-up from the meter body to avoid damage during repair.
2. Remove the retaining ring from one end of the meter.
3. Remove the rotor support from the body. If the rotor support is jammed in the body, use a pair of pliers or vice grips to break the rotor support free.

4. The rotor may also be removed at this time.
5. Remove the retaining ring from the opposite side of the meter.
6. Remove the second rotor support.

INSTALLATION OF NEW KIT

IMPORTANT: Before reassembly, note there are weep holes on each rotor support, these weep holes must be facing down toward the bottom of the meter body when installed.

The meter must be reassembled with the arrowheads on the rotor pointed in the direction of fluid flow. The magnetic pick-up side of the body signifies the up position. This is the position that the repair kit was calibrated, and this is the position to be used to ensure meter accuracy. Due to the specification of 3-A, there are no arrows on the rotor support to indicate which rotor support is to be placed upstream or downstream. Please install the repair kit as it was received in the box, using the arrow on the rotor to determine the placement of the rotor support.

1. Install one of the rotor supports into the body bore, noting the orientation of the weep hole.
2. Secure a retaining ring in the groove provided. Be sure that the retaining ring is completely installed in the groove.
3. Insert the rotor and second rotor support in the opposite side of the body, noting the orientation of the arrow on the rotor and the weep hole on the rotor support.
4. Secure the second retaining ring in the opposite groove. Be sure that the retaining ring is completely installed in the groove.
5. Check the meter by blowing air through the assembly. If the rotor does not turn freely, the meter should be disassembled and checked for anything that would obstruct movement of the rotor.

CAUTION: Excess air pressure may damage the rotor and bearings by overspinning

6. Install the magnetic pick-up.

Each FloClean repair kit has been cleaned at the factory per 3-A specifications and handled with care. However, it is recommended that the meter be cleaned after the repair kit has been installed.

NOTE: After installing the repair kit, the electronics will need recalibration. Refer to the electronics' installation and operation manual. If there are any questions on recalibration, contact Blancett at 1.800.235.1638 or contact the manufacturer of the associated electronics.

STATEMENT OF WARRANTY

Blancett Flow Meters, Division of Racine Federated Inc. warrants to the end purchaser, for a period of one year from the date of shipment from the factory, that all flow meters manufactured by it are free from defects in materials and workmanship. This warranty does not cover products that have been damaged due to defects caused by misapplication, abuse, lack of maintenance, modified or improper installation. Blancett's obligation under this warranty is limited to the repair or replacement of a defective product, at no charge to the end purchase, if the product is inspected by Blancett and found to be defective. Repair or replacement is at Blancett's discretion. A return goods authorization (RGA) number must be obtained from Blancett before any product may be returned for warranty repair or replacement. The product must be thoroughly cleaned and any process chemicals removed before it will be accepted for return.

The purchaser must determine the applicability of the product for its desired use and assumes all risks in connection therewith. Blancett assumes no responsibility or liability for any omissions or errors in connection with the use of its products. Blancett will under no circumstances be liable for any incidental, consequential, contingent or special damages or loss to any person or property arising out of the failure of any product, component or accessory.

All expressed or implied warranties, including **the implied warranty of merchantability and the implied warranty of fitness for a particular purpose or application are expressly disclaimed** and shall not apply to any products sold or services rendered by Blancett.

The above warranty supersedes and is in lieu of all other warranties, either expressed or implied and all other obligations or liabilities. No agent or representative has any authority to alter the terms of this warranty in any way.

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RFI Racine Flow Meter Group **Blancett** **DYNASONICS** **Flo-tech** **HEDLAND** **PRESO** **racine**

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