

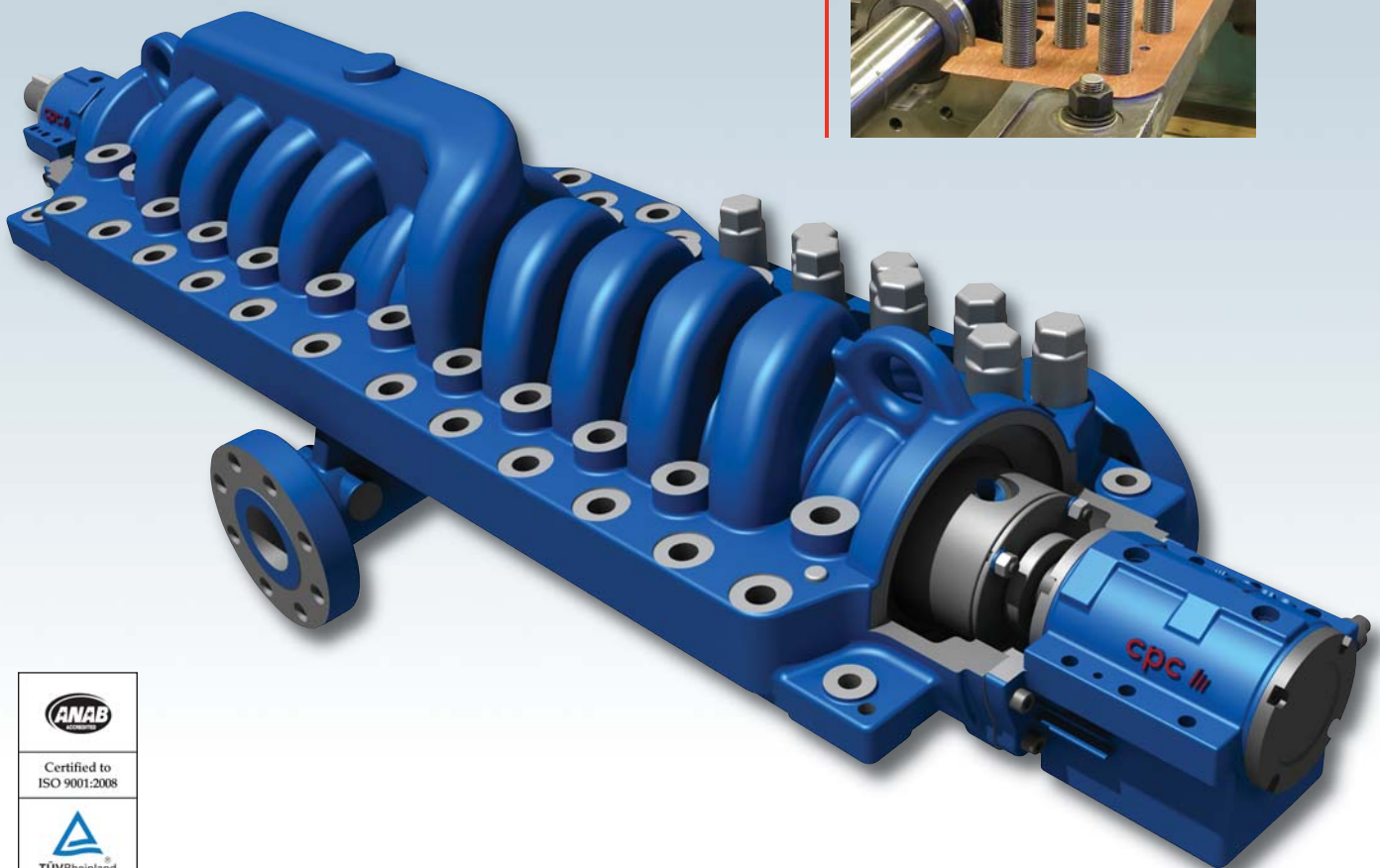
**cpc** // Pumps  
INTERNATIONAL

FORMERLY

**unitedpumps**  
OF CANADA LTD

## CPC Pumps Model HM/HMD

API 610/ISO 13709, TYPE BB3  
Axially Split Multistage Pump





# Model HM/HMD

## Operating Parameters:

- Flow rate in excess of 4,400 USGPM (1,000 m<sup>3</sup>/h).
- Differential heads up to 5,600 FT (1,700 m).
- Temperatures up to 400 Deg. F (200 Deg. C).
- Standard Design Working Pressure of 2,250 PSIG (15,000 kpag).

## Standard Features:

- Wide hydraulic coverage.
- Application tailored hydraulic selections.
- 600/900/1500# flange ratings.
- Available in all API 610 Table H.1 materials.
- Hydraulically opposed impeller arrangement for thrust balancing.
- Axially split, precision milled parting flanges.
- Split case wear rings and center bushings for ease of maintenance.
- Integral balance line.
- Rigid design shaft for minimal deflection to meet and exceed API 610 requirements.
- Inpro/Seal bearing housing closures.
- Heavy Duty baseplate, drip rim or drip pan designs.

## Optional Features:

- High pressure special casing design.
- Positive retention of impellers in both directions.
- Fan/Heat-sink bearing housing cooling arrangement for operation at elevated temperatures, to eliminate the need for cooling water.
- Magnetic bearing housing isolators.
- All bearing combination arrangements are available where suitable: Ball/Ball, Sleeve/Ball, Tilt Pad/Sleeve.

### Case Wear Rings

- Tongue register
- Anti-rotation pin used, at split line

### Cylindrical or Tapered Shaft Ends

- To meet customer preference

### Seal Chamber

- Full compliance with API 682 requirements
- Ample space for dual mechanical seals
- Ease of access for maintenance

### Split Center Bushing

- For ease of inspection, removal and re-installation

### Interstage Bleed-off Connections (Optional)

### Impellers

- Dynamically balanced
- Individually secured (Optional)
- Opposed impellers for axial thrust

### Bolted-in Single Piece Interstage Flow Straighteners

### Low NPSH Performance Available

- Double suction impeller for lower NPSHR (Model HMD)

### INPRO™ Bearing Isolators

- Effective lubricant contamination protection

### Available Bearing Arrangement

- Sleeve/ball
- Ball/ball
- Sleeve/tilt pad (Shown)

### Axially Split Casing

- Near centerline mount
- Full range of design pressures

### Replaceable Impeller Wear Rings

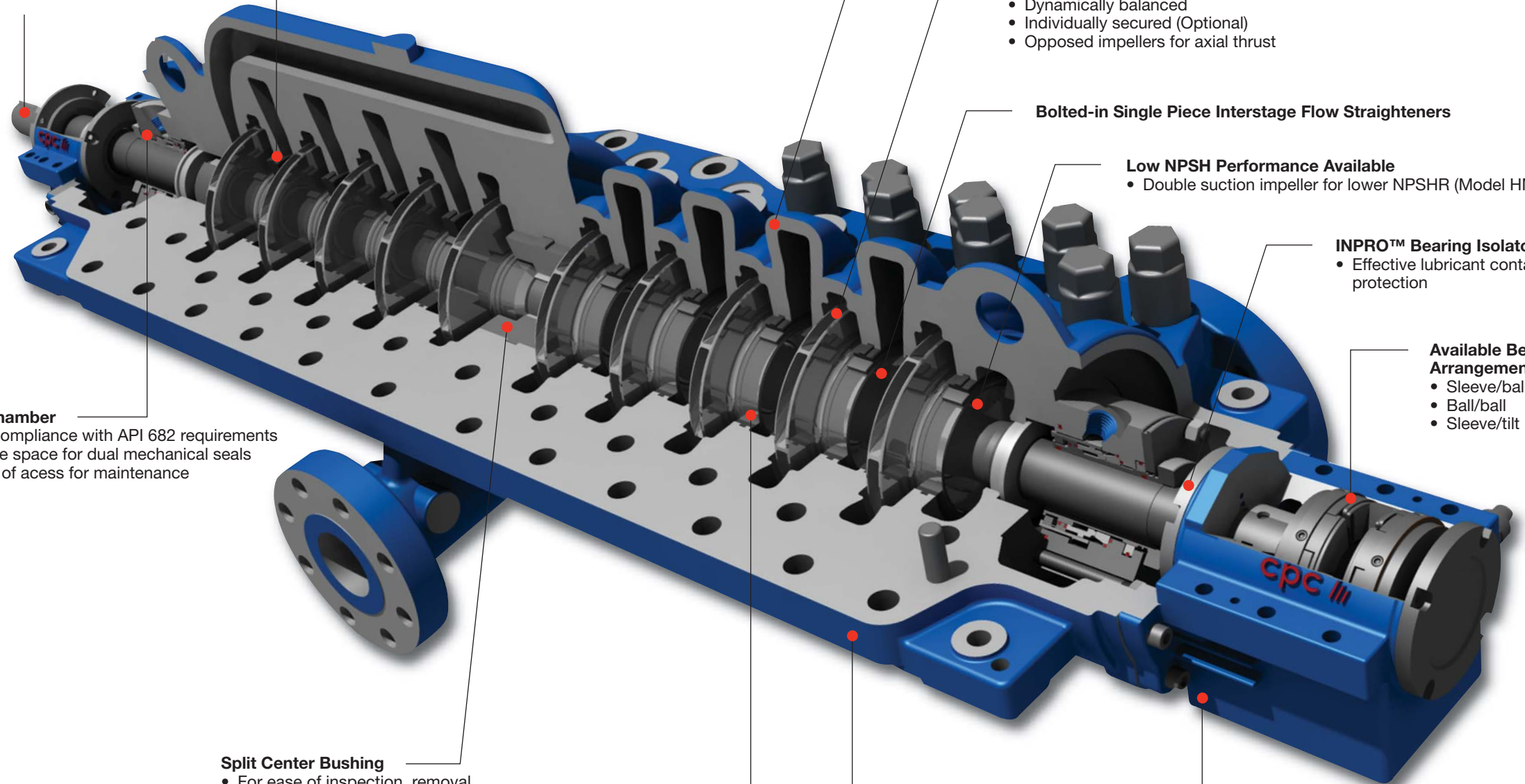
- Optional integral impeller ring

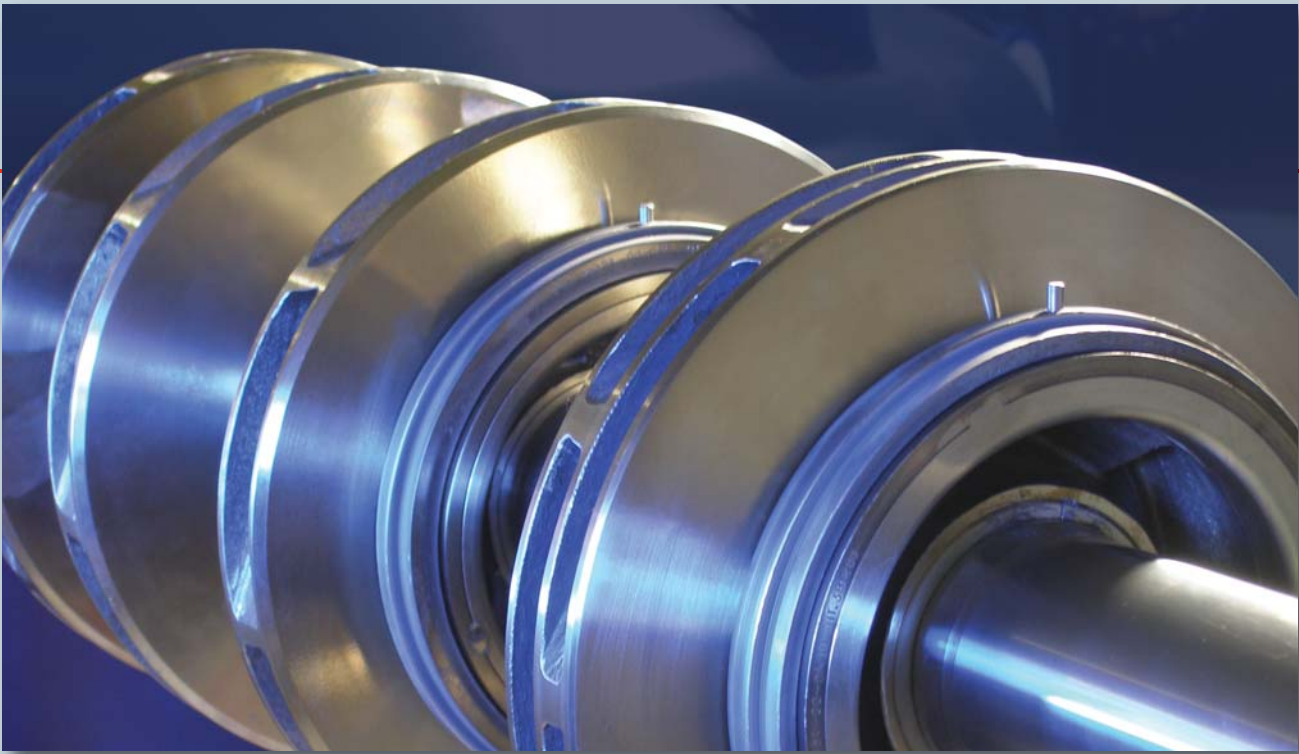
### Integral Balance Line (Not shown)

- Both seal cavities operate at the same pressure (Not shown)

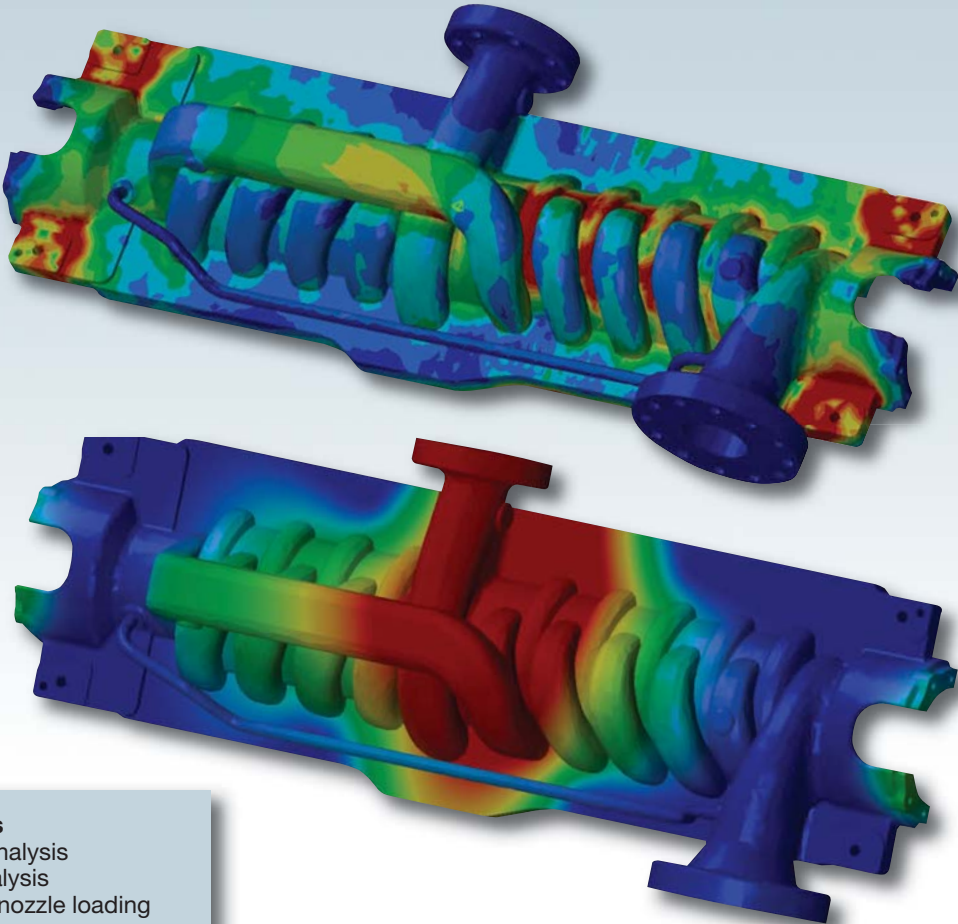
### Bearing Assembly

- Finned housings for improved heat dissipation
- Cooling fan option
- Flood or ring oil lubrication
- Purge or pure oil mist lubrication





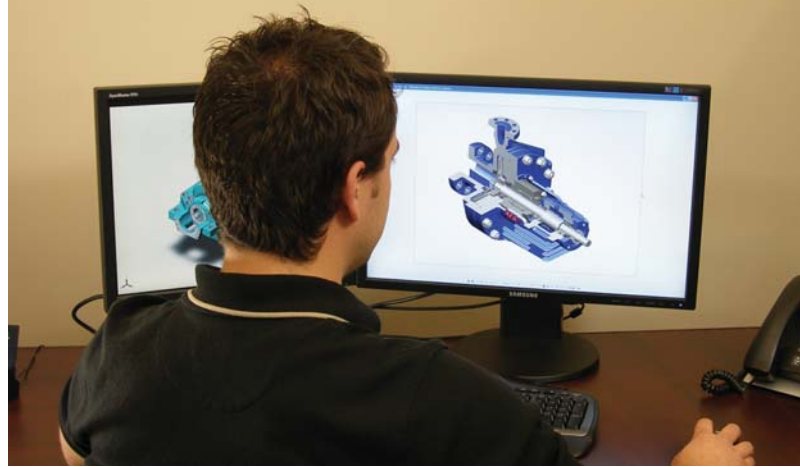
Precision Cast Impellers



- FEA Studies**
- Thermal analysis
  - Stress analysis
  - Effects of nozzle loading
  - Natural frequency

# Capabilities

CPC Pumps has 50+ years experience manufacturing API / ISO centrifugal pumps. Using the most up to date technologies, from manufacturing to assembly and testing, CPC Pumps has what it takes to provide equipment that exceeds industry standards.



# Sales / Service Locations

## THE AMERICAS

### CANADA

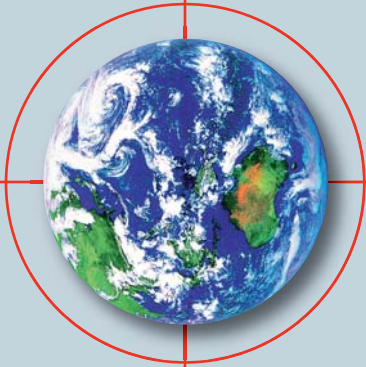
Calgary  
Montréal  
Toronto  
Vancouver

### USA

Houston, TX  
Dallas, TX  
Tyler, TX  
Alabama  
Alaska  
California  
Colorado  
Delaware  
Florida  
Indiana  
Louisiana  
Maryland  
Michigan  
Montana  
New Jersey  
North Dakota  
Ohio  
Pennsylvania  
Washington  
Wyoming

### CARIBBEAN

Trinidad & Tobago



## EUROPE

Contact CPC Pumps International

## ASIA PACIFIC

Brunei  
China  
India  
Indonesia  
Japan  
Malaysia  
Pakistan  
South Korea  
Taiwan  
Thailand

## MIDDLE EAST

Iraq  
Lebanon  
Qatar  
Saudi Arabia  
Sultanate of Oman

### For these and all other locations please contact

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sales@cpcpumps.com  
[www.cpcpumps.com](http://www.cpcpumps.com)