## **MEMORANDUM**

TO:	Ex parte communications, U.S. Department of Energy (DOE)
FROM:	Andrew deLaski, ASAP and Robert Asdal, Hydraulic Institute
DATE:	May 10, 2012
RE:	Energy Conservation Standards for Pumps

The purpose of this memorandum is to memorialize a meeting on May 1, 2012 at the Department of Energy (DOE) pursuant to DOE's guidance on ex parte communications. The following individuals were present at the meeting:

DOE
DOE, Office of General Counsel
DOE, Office of General Counsel
Hydraulic Institute
Colfax/IMO
Xylem, Inc.
Patterson Pump
Grundfos Pump
American Council for an Energy-Efficient Economy
Appliance Standards Awareness Project
Appliance Standards Awareness Project
Natural Resources Defense Council
Earthjustice
Alliance to Save Energy

The non-governmental participants at the meeting are working jointly through the Hydraulic Institute (HI) and the Appliance Standards Awareness Project (ASAP) (together referred to as joint stakeholders) to pursue a consensus agreement for energy conservation standards for pumps. The purpose of the meeting was to present to DOE the path forward that the joint stakeholders are pursuing and to discuss how DOE can assist with data and analysis to support the negotiations.

It was explained that HI was established in 1917, and represents nearly 100 manufacturing companies, the majority of whom are pump OEMs. Associate members include manufacturers of motors, drives, seals, couplings, and other related products used in pumps or pumping systems. HI's leadership role as an ANSI-approved standard-writing association is well established, with thirty standards and five technical guidelines. HI's eight different pump test standards, including ANSI/HI 14.6 for rotodynamic pump tests, are widely used and referenced in the U.S. The Hydraulic Institute has also collaborated with Europump and ISO in writing a new global test standard. It was also noted that HI has also led in the establishment of Pump Systems Matter, a 501(c) 3 educational organization focused on educating the marketplace on optimizing pumping systems for energy efficiency, which is broadly supported by the pump industry.

Members of HI described the approach that the EU has taken to develop efficiency standards for water pumps and presented a summary of the draft EU standards including the scope of coverage, efficiency metrics, and standard levels. Members of HI also described the "extended product" approach, which includes the pump, motor, drive, and feedback controls, and explained how much greater energy savings can be achieved from standards for "extended products" than from standards for just the pump.

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A package of HI and PSM information was provided to DOE staff that included the following:

## Attachments:

- A: Joint HI/ASAP letter to Roland Risser, dated April 30, 2012
- B. Vision and Mission of Hydraulic Institute
- C. Vision and Mission of Pump Systems Matter
- D. Summary of HI Standards Relating to Energy Efficiency
- E. Membership Benefits Overview: HI & PSM
- F. Summary of 2011 Accomplishments: HI & PSM
- G. Overview of Pump Systems Matter
- H. Course Overview: Pump Systems Optimization: Energy Efficiency and Bottom-Line Savings
- I. Brochure: Hydraulic Institute Standards Overview
- J. Brochure: HI Standards-Subscription Options

Additionally, the following handouts were shared at the meeting to help explain the EU approach for water pump standards and extended product. These included:

- K. Definition of Extended Pump Product (slide #8)
- L. Pump Product Types: Kinetic (Centrifugal) and Positive Displacement (slide #13)
- M. Scope Applied in Developing Estimate (slide #16)
- L. Product Types within Scope (slide #18)
- M. MEI Pump Evaluation Tool (slide #34)
- N. Application Results (slide #35)
- O. Recommendation (Summary) (slide #46)

The joint stakeholders conveyed that any data and/or analysis that DOE can provide could help advance the negotiations, and the stakeholders requested a meeting with DOE's consultants to discuss the details of the EU approach.