

## Short Course P5

### Pump Cavitation Physics, Prediction, Control, Troubleshooting

---



**Bruno Schiavello** has been Director for Fluid Dynamics at Flowserve since 2000 and previously served with Ingersoll Dresser Pump Company. Mr. Schiavello was co-winner of the H. Worthington European Technical Award in 1979. He has written several papers and lectured at seminars on pump recirculation, cavitation, and two-phase flow. He is a member of ASME, has received the ASME 2006 Fluid Machinery Design Award, and has been Co – Lead Organizer of ASME Pumping Machinery Symposium in 2005, 2009, and 2011. He has served on the International Pump Users Symposium Advisory Committee since 1983. Mr. Schiavello earned a B.S. degree (Mechanical Engineering, 1974) from the University of Rome and an M.S. degree (Fluid Dynamics, 1975) from Von Karman Institute for Fluid Dynamics, Rhode St. Genese, Belgium.

---



**Frank Visser** is the Engineering Specialist in Hydraulics with Flowserve (FSG Pumps) Central Engineering Group, in Etten-Leur, The Netherlands. He joined Flowserve in 1995 and has held several positions in research, development, and (product) engineering. His key expertise and interests relate to fluid mechanics, CFD and thermo-dynamics of (centrifugal) pumps and hydraulic turbines, on which he has authored & co-authored multiple technical papers in journals and proceedings. Dr. Visser obtained a B.S. degree (Mechanical Engineering, 1985) from Technical College Alkmaar, The Netherlands, and an M.S. degree (Mechanical Engineering, 1991) and Ph.D. degree (Technical Sciences, 1996) from the University of Twente, Enschede, The Netherlands. He is a member of the Royal Institution of Engineers in the Netherlands, and of ASME, of the Industrial Board for the J.M. Burgerscentrum, Research School for Fluid Mechanics, and he is Associate Editor for ASME Journal of Fluids Engineering.