

CH2M HILL



Civil Infrastructure

USA

www.ch2m.com



ANSYS® CFX®

Overview

CH2M HILL is an employee-owned, multinational firm providing engineering, construction, operations, communications, security, environmental, and related services to public and private clients in numerous industries on six continents.

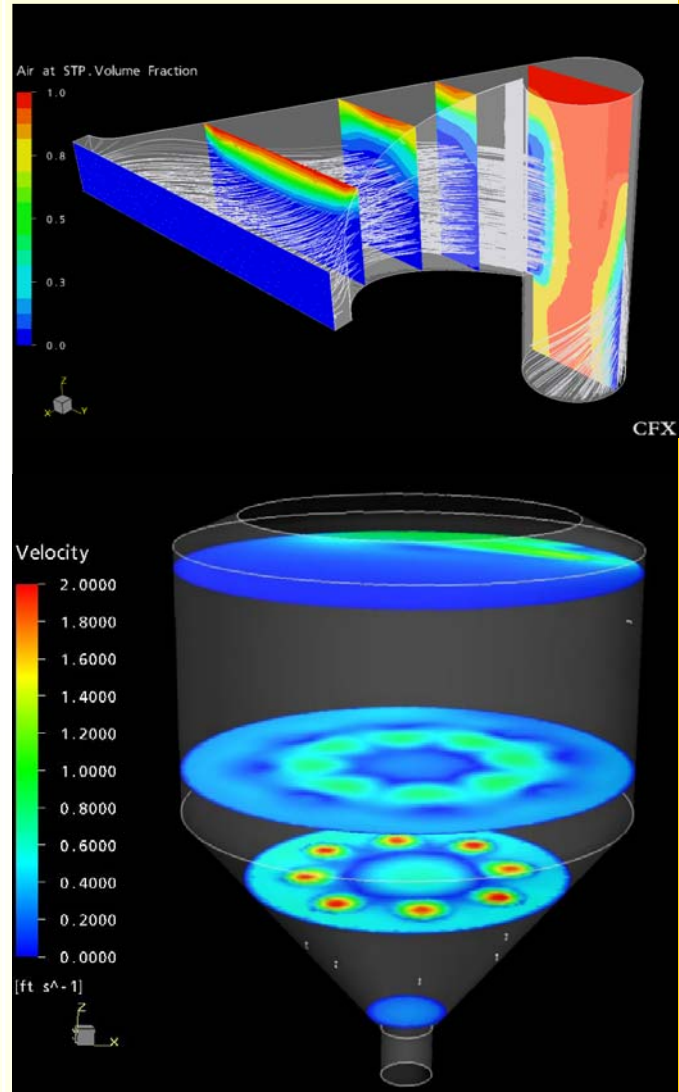
Year in and year out, CH2M HILL receives numerous industry awards and other notable recognition. Of special note, the firm was named in 2003 as one of Fortune magazine's Best Places to Work. In 2001, the firm received the Small Business Administration's Award of Distinction and Dwight D. Eisenhower Award. CH2M HILL's utility operations company, OMI, received the 2000 Malcolm Baldrige National Quality Award.

Testimonial

"ANSYS CFX is a powerful general-purpose tool that I only dreamed of during most of my 33-year hydraulics career with CH2M HILL. Now that I have it, and it is continuously getting better, I can solve a wide array of hydraulics and process problems with precision that were formerly just 'guesstimates'."

Allen L. Davis

Allen L. Davis, Ph.D., P.E.
Principal Hydraulic Engineer



Challenge

CH2M HILL projects involve large-scale structures, making onsite process automation impractical.

Scale model testing is time-consuming, expensive, and can be unreliable due to scaling effects.

The physics of the processes involved are complex involving transient, turbulent, multiphase flows.

Solution

ANSYS CFX has allowed simulation of complex flows in a diverse range of applications including: vortex drop shafts for wastewater systems, tank mixing and storage for treatment plants and open channel intakes for hydraulic power plants.

Benefits

Simulation eliminates the need for expensive model testing and can be completed in a fraction of the time.

Accurate and reliable multiphase flow models have yielded simulation results which have been found to conform closely to the performance of installed systems.

The ease of use of ANSYS CFX, combined with excellent technical support, has allowed CH2M HILL to make the most of their CFD investment.