

Driven Pile Committee

The Driven Pile Committee is generating momentum on current and new committee projects. We encourage members to join the committee, and welcome new ideas for project initiatives.

The committee continues to support joint seminars with PDCA, and we look forward to our next joint event: a one-day seminar in Austin, Texas, on September 9, 2014. This seminar follows successful seminars in Baltimore (March 2010), Chicago (March 2011), Calgary, Alberta, Canada (June 2012), and Nashville (November 2013). The seminar program includes a mix of presentations from owners, design engineers, contractors and manufacturers that highlight innovative and challenging design and construction aspects of driven pile projects.

Our committee took the lead on organizing the annual SuperPile conference held in Cambridge, Mass., in June. Many thanks to committee member Les Chernauskas, who served as the chair of the planning committee for this successful, multi-committee piling conference.

The Driven Pile Committee is committed to pursuing several current projects that advance the use and understanding of driven pile systems. The committee gathered a series of case histories showcasing cost-effective driven pile solutions through optimizing pile types and materials, utilizing pile testing to reduce uncertainties, accounting for pile set up in design, increasing allowable loads/allowable design stresses through design, and using more reliable pile driving criteria. These case histories will be highlighted on the committee webpage.

We are also updating existing DFI guidance documents, including the *Inspector's Manual for Driven Pile Foundations* (Second Edition 1997) and *A Pile Inspector's Guide to Hammers* (Second Edition, 1995); combining these texts into a single document. Additionally, we plan to update the manual on *Driven Foundation Piling* (1998). Considering the continuous development of new types of driven piles, the committee aims to create a web-based manual.



Through the DFI Committee Project Fund, the committee is working with the Concrete Reinforcing Steel Institute (CRSI) on updates to the CRSI Design Handbook tables used for pile cap design. Updates will reflect the latest code provisions contained in ACI 318-11, higher strength steel pipe piles (capacities up to 1800 kips [816 tonnes]), understanding of deep pile cap behavior as presented in the literature, and finite element modeling. The work is being performed by Professor Timothy Mays of The Citadel and cofunded by DFI (\$15,000), and CRSI and others (\$39,000). Deliverables, including user-friendly spread-sheets, tables and supporting calculations, and a finite element modeling report, are scheduled to be available fall 2014.

The committee is also supporting the Marine Foundations Committee in its comparative study on vibratory versus impact piles (discussed below in the Marine Foundations Committee report).