## BPUD PIPELINE

## SPRING 2010

270 Elm Road, P.O. Box 390, Bolinas, CA 94924 (415) 868-1224



At the end of every month, BCPUD staff read customer water meters to determine how much water has been consumed, and nearly every month our staff encounters difficulty accessing certain meters. In some cases, customers have parked vehicles or storage units on top of the meter, in other cases customers have piled vegetative or other debris on top of the meters and, on occasion, customers have fenced in their water meters! Please -take a few minutes to locate your water meter and make sure that is accessible *at* all times. If you need any assistance locating your water meter, please call us at 868-1224 and we'll send someone to help you. All BCPUD water meters are located in the public rights-ofway and should never be fenced in or obstructed. Please be considerate of your local BCPUD staff and our operational needs and make sure your water meter is accessible. Thank you!

\*\*\* Water or Sewer-Related emergency? Call 868-1224

## **TERRACE AVENUE -- PAST, PRESENT AND FUTURE**

As the community is well aware, Terrace Avenue just to the east of the intersection with Overlook Road is collapsing and the County of Marin Department of Public Works ("DPW") has closed the road indefinitely. The collapse began during the storms of January 2010 and the road has continued to slump since that time. The County DPW has monitored the site carefully since the collapse began and immediately took steps to maintain the integrity of the County's storm drain system when the slippage exposed the drain pipe (*see photo showing exposed and stabilized storm drain*). In a press release issued shortly after the road closure, County officials were cautious about next steps with regard to the road: "We understand the importance of this road to the Bolinas community," said Supervisor Steve Kinsey, "and I know that efforts will be made to reopen the road if at all possible." DPW Chief Assistant Director Bob Beaumont agreed and said: "Our crews are actively monitoring the site, but we have to wait for the site to dry out before we can assess the extent of the damage and see if reopening the road is possible."

In the same press release, Bolinas officials stressed the vital significance of Terrace Avenue to the BCPUD, the Bolinas Fire Protection District and the County: "All three of our agencies share the goal of preserving Terrace Avenue as a through road," said BCPUD Board President Jack Siedman, noting that Terrace Avenue is one of only two egress routes off of the Bolinas Mesa and from the southern end of the Point Reyes National Seashore. "Many community members



have expressed to us that Terrace Avenue is a critical artery in the Bolinas road system and all efforts should be made to keep the road open", Siedman said. "Our concern is with access," commented Fire Chief Anita Tyrrell-Brown. "If Mesa Road [the other egress road out of town] is



blocked by downed trees and power lines, residents living on the Bolinas Mesa will have no route out of town and our emergency vehicles will be unable to access a significant portion of the community."

In addition to access problems, the BCPUD's infrastructure is vulnerable to coastal bluff erosion and road collapse. Several years ago the district relocated its water main off of the top section of Terrace Avenue; thanks to the foresight of former General Manager Phil Buchanan and staff, a potential water emergency was avoided this winter. The BCPUD remains concerned, however, with the integrity of Terrace Avenue at Surfer's Overlook, which also is threatened by bluff erosion, because the district has both water and sewer mains in that section of Terrace Avenue. The district has commissioned engineering plans to relocate these utility mains and has applied for funding to implement those projects. The district antici-

pates a response to at least one of its funding requests (for the water main relocation) by this summer.

At the same time, the BCPUD and the Bolinas Fire Protection District ("BFPD") actively are working with the County Department of Public Works ("DPW") and Supervisor Kinsey to determine whether it is possible to stabilize Ter-

race Avenue at Surfer's Overlook, thereby preserving homeowner and emergency vehicle access and possibly eliminating the need to relocate both of the utility mains. To that end, each of the two local districts have appointed representatives to work with the County and regularly report to the BCPUD and BFPD Boards of Directors about their progress. The BCPUD, BFPD and the County have jointly committed a total of \$50,000 in funds toward retaining geo-technical engineers (and/or other appropriate professionals) to assess the conditions at Surfer's Overlook and recommend a conceptual design for a stabilization project. The agencies hope to retain a qualified engineer (or other appropriate professional) by May 2010. In addition, BCPUD and BFPD representatives have researched other coastal bluff stabilization projects in California, including various construction techniques and permit requirements. In February 2010, BCPUD and BFPD representatives visited a bluff stabilization project underway in Santa Cruz which has been designed for the purpose of preserving the road and utilities above. The stabilization construction technique for this project consists of soil nails, tie-backs and sculpted concrete, which is finished to resemble the natural bluff. (See photo at right of a finished section of the Santa *Cruz project.*) At this point in time, it is too soon to say whether a project like this will be necessary or recommended to stabilize Terrace Avenue at Surfer's Overlook, but it is a representative example of the types of projects underway in other communities in Northern California as they grapple with similar threats to infrastructure and property posed by coastal bluff erosion.

