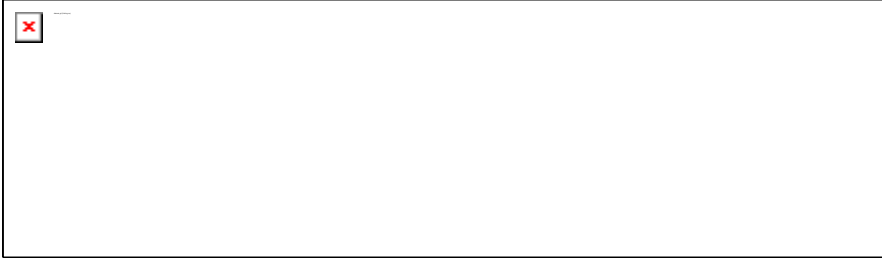


sheer and bond tests (2)



March 8, 1985

ICS/Penetron International Ltd.
45 Research Way
Suite 203
East Setauket, NY 11733

Re: Information of Client

This report is part of report dated March 7, 1985, and should be attached to same.

The following is the concrete mix design used in the laboratory to cast concrete specimens used for the shear and bond tests as shown in our report dated March 7, 1985.

CONCRETE MIX DESIGN

Materials per Cubic Yard

(Aggregates S.S.D.)

| | |
|--------------------|--------|
| CEMENT (sk) | 6.5 |
| CEMENT (lb) | 611 |
| SAND (lb) | 1270 |
| GRAVEL (lb) | 1710 |
| GALS OF WATER | 36.2 |
| DARAVAIR (oz/yd) | 6.5 |
| W/C RATIO (gal/sk) | 5.57 |
| AIR CONTENT (%) | 5.0 |
| SLUMP (in) | 2 to 3 |

CYLINDER TESTS ON ABOVE MIX

14 DAY P.S.I. * 4290

28 DAY P.S.I. * 4846

* - Average of Two (2) Cylinders

PROCEDURE USED:

A. Shear Tests

Specimens were cast in 6" x 6" x 20" beam molds and when sufficiently aged were tested in shear.

B. Bond Tests

In Test No. 1, No. 5 rebars were imbedded in concrete and when sufficiently aged were tested in tension.

Specimens for Test No. 2 were Cast in dimensions according to ASTM C-321-64, (Bond Strength of ChemicalResistant Mortar) and when sufficiently aged were tested on a special test head as shown in Figure 4 of ASTM C-321.

NOTE:When evaluating the test results, consideration should be given to the comparison between small size laboratory specimens and large concrete field members. Also, the laboratory specimens received full coats of slurry and powder over entire surfaces. It is possible that the laboratory specimens were subjected to more stringent procedures than may be found in the field.

