ROBERT SILMAN ASSOCIATES, PLLC

STRUCTURAL ENGINEERS

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DATE: 3/30/2004	JOB NO.: Pending	REPORT #: 1
DATE(S) ON SITE: Tuesday, March 30, 2004		
PROJECT: **Moss-Crute Residence**		
LOCATION: **304 Maryland Avenue NE, Washington, DC**		
CONTRACTOR: **None**		
OWNER: **Ms. Debra Moss**		
WEATHER: **40 deg F and cloudy**		
PRESENT AT SITE: **RSA, Christopher Cobb, P.E.** **Owner, Debra Moss** **Architect, Andre Houston**		

TO: **Houston & Heyne**
1053 31st Street, NW
Washington, DC 20003

ATTN: **Andre Houston**

CC: **File**

THE FOLLOWING WAS NOTED:

At the direction of the Owner, RSA performed a visual survey of a previous one-story addition to her Capitol Hill row house located at 304 Maryland Avenue NE, Washington, DC. Based upon construction methods employed, the addition appears to pre-date 1940. The following signs of distress and deterioration were noted:

EXTERIOR

- The existing brick mortar joints exhibit significant cement/lime loss. The original sand particles can be removed easily with a fingernail.
- In discrete locations, the exterior wythe of brick appears to have delaminated from the inner wythes and displaced out of plane.
- The foundation wall was previously parged with a cementitious material. This coating appears to have suffered water infiltration and freeze-thaw damage. Cracking of the parging above the first floor was also noted.
- The original wood lintels of basement level window openings (now in-filled with brick masonry) exhibit extreme levels of decay. This decay has apparently caused vertical displacement of the brick above and first floor joists beyond.
- The wood windowsills have suffered substantial water damage and subsequent material loss.

INTERIOR

- Water damage to plaster and tile finishes is apparent at the interior of the existing kitchen and corresponds with the end of the original structure. The damage appears to be due to a failed flashing condition caused by the brick deterioration behind.
- Brick efflorescence was noted at the interior face of the storage space, a further sign of water infiltration to the inner wythes of masonry.
- No out-of-plane movement was noted.

BZA
Case No. 17177
Exhibit No. 10

FIELD REPORT

SIGNED:

Board of Zoning Adjustment
District of Columbia
CASE NO. 17177
EXHIBIT NO. 10

RECOMMENDATIONS

- The existing one-story wood structure should be removed to the top of the foundation level.
- The outer wythe of the existing brick foundation wall should be removed and rebuilt in staggered stages, maximizing the re-use of the original brick. The existing brick headers should remain intact so to provide a constant tie to the inner wythe(s) to remain.
- The original wood lintels should be removed entirely and replaced with new brick masonry.
- The existing sill plate may require replacement, as much of the water infiltration problems may initiate there. The existing deteriorated sill plate shall be replaced with new pressure treated material and termite shield throughout.
- The existing basement windows and door should be removed during the masonry work and either replaced or re-installed at the Owner's discretion.

If you should have any question regarding the content of this report, please feel free to contact me directly at 202.333.6230.

Thank you,

Christopher A. Cobb, P.E.
Senior Engineer

SIGNED: