Mezzanine Inspection Report

Date: 03/16/15	**Station Name:** K08 - Vienna	**Mezzanine #:** 103	**Completed By:** Mike Butler

Summary

It was not possible to complete video scoping or pull string installation in faregate array because the communication and power ducts are at capacity. In addition, the power duct between Kiosk, Handhole 1 and AFC Panel is also at capacity, therefore video scoping and pull string installation could not be completed.

After scanning of the mezzanine floor, an alternate duct was found between the Kiosk and “Handhole 1A”, which is located on the mezzanine floor close to Room 400. Video scoping and pull string installation was successfully completed in the alternate duct between the Kiosk and Handhole 1A. Since there is no duct that goes from Handhole 1A to AFC Panel, it is proposed to install a new in-floor duct from Handhole 1A to Room 400. A new handhole is proposed where the duct turns 90-degrees. Once inside Room 400, the duct will transition to an overhead conduit via a proposed junction box at the base of the wall. The proposed conduit will rise up and core drill through the wall into Room 406 and then feed into the AFC Panel.

Refer to photos and drawings for further information on existing layout and proposed solution.

Photos and drawings are for reference purposes only; see new schematic drawing/proposed pathway on last page.

Scoping of Faregate Array(s)

Task	Yes/No	Notes
Communications Duct –Faregate Array (~~11~~ 12 gates)		
Was video scoping completed for the entire duct run?	No	
Were pull strings installed at all faregates in the array?	No	
Were there any obstructions or blockages? Provide details of type and specific location.	N/A	
Is the duct at capacity? Provide additional details about the dimensions of ducts and number of wires.	Yes	Duct is at capacity, 60-80% full. It was not possible to completed video scoping or pull string installation.
Power Duct - Faregate Array (~~11~~ 12 gates)		
Was video scoping completed for the entire duct run?	No	
Were there any obstructions or blockages? Provide details of type and specific location.	N/A	
Is the duct at capacity? Provide additional details about the dimensions of ducts and number of wires.	Yes	Duct is at capacity, 60-80% full. It was not possible to completed video scoping.

Scoping of Existing Power Duct - Kiosk to AFC Panel		
Task	**Yes/No**	**Notes**
Kiosk to Handhole 1 (Distance: 65')		
Was video scoping completed for the entire duct / conduit run?	No	
Was pull string installed?	No	
Were there any obstructions or blockages? Provide details of type and specific location.	N/A	
Is the duct / conduit at capacity? Provide additional details about the dimensions of duct / conduit and number of wires.	Yes	Duct is at capacity, 60-80% full. It was not possible to completed video scoping or pull string installation.
Handhole 1 to AFC Panel (Distance: 8')		
Was video scoping completed for the entire duct / conduit run?	No	
Was pull string installed?	No	
Were there any obstructions or blockages? Provide details of type and specific location.	N/A	
Is the duct / conduit at capacity? Provide additional details about the dimensions of duct / conduit and number of wires.	Yes	Duct is at capacity, 60-80% full. It was not possible to completed video scoping or pull string installation.
Scoping of Alternate Power Duct - Kiosk to Handhole		
Task	**Task**	**Task**
Kiosk to Handhole 1A (Distance: 68')		
Was video scoping completed for the entire duct / conduit run?	Yes	Refer to "WMATA Vienna 6inch HH to Kiosk Proposed new route for Power.avi"
Was pull string installed?	Yes	
Were there any obstructions or blockages? Provide details of type and specific location.	No	
Is the duct / conduit at capacity? Provide additional details about the dimensions of duct / conduit and number of wires.	No	6" duct with no wires.
Observations / Issues / Next Steps		
- The total distance of the proposed power route between the Kiosk and AFC Panel is 97', including 68' of alternate duct, 11' of proposed duct and 18' of proposed conduit.		

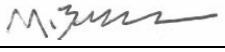
Sign Off		
	GFP Representative	**WMATA PRGM**
Name:	Mike Butler	
Signature:		
Date:	03/23/15	

Photo 1 – Existing / Proposed duct layout on mezzanine floor

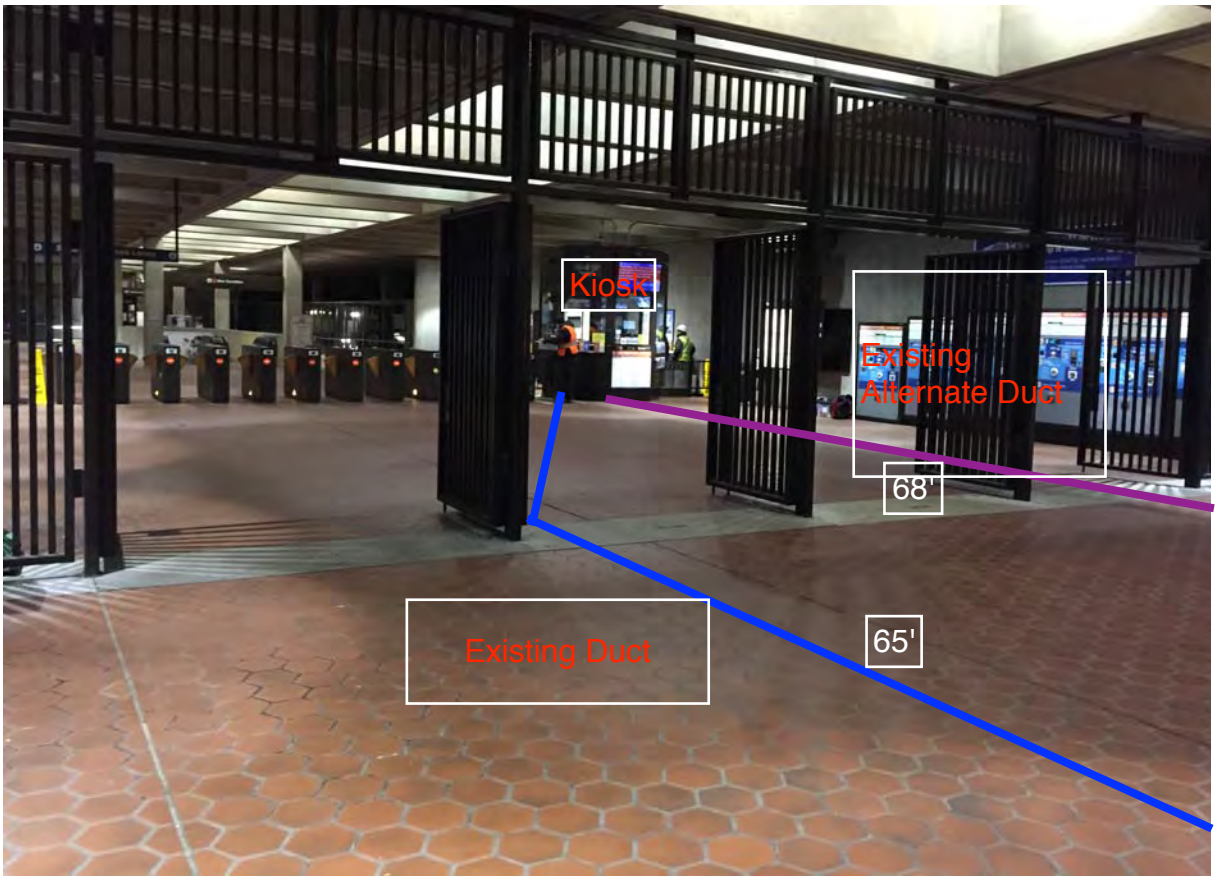


Photo 2 – Existing / Proposed duct layout on mezzanine floor

Photo 3 – Existing / Proposed duct layout on mezzanine floor

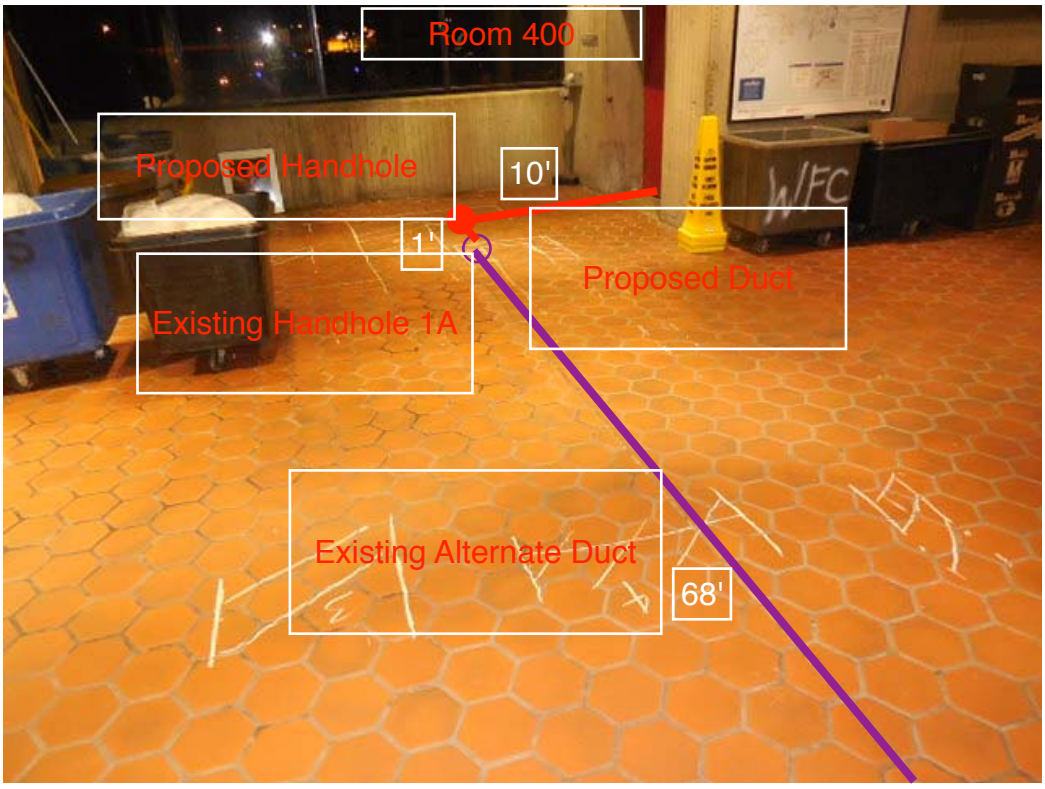
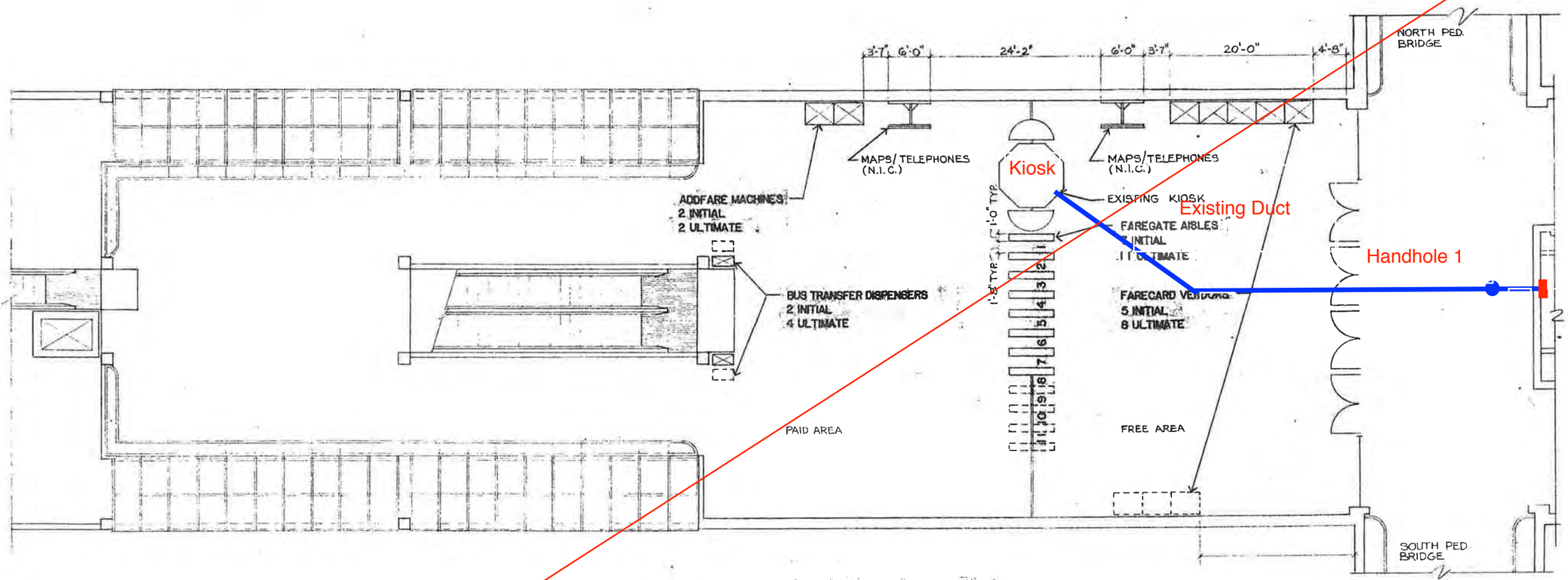


Photo 4 – Existing / Proposed duct layout on mezzanine floor

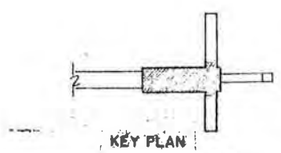
Photo 5 – Proposed Duct / Conduit transition in Room 400

EXISTING DUCT LAYOUT

See new schematic drawing/proposed pathway on last page



MEZZANINE PLAN



DESIGNED	HWA	11-10-82	DATE
DRAWN	GBO	11-10-82	DATE
CHECKED			DATE
APPROVED			

REFERENCE DRAWINGS	
NUMBER	DESCRIPTION

REVISIONS			
DATE	BY		DESCRIPTION
7-11-84	RAB	1	EMERGENCY EXIT GATE ADDED

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY

WMATA

APPROVED _____ DIRECTOR OF ARCHITECTURE

APPROVED _____

DE LEUW, GATHER & COMPANY
GENERAL ENGINEERING CONSULTANT ☐

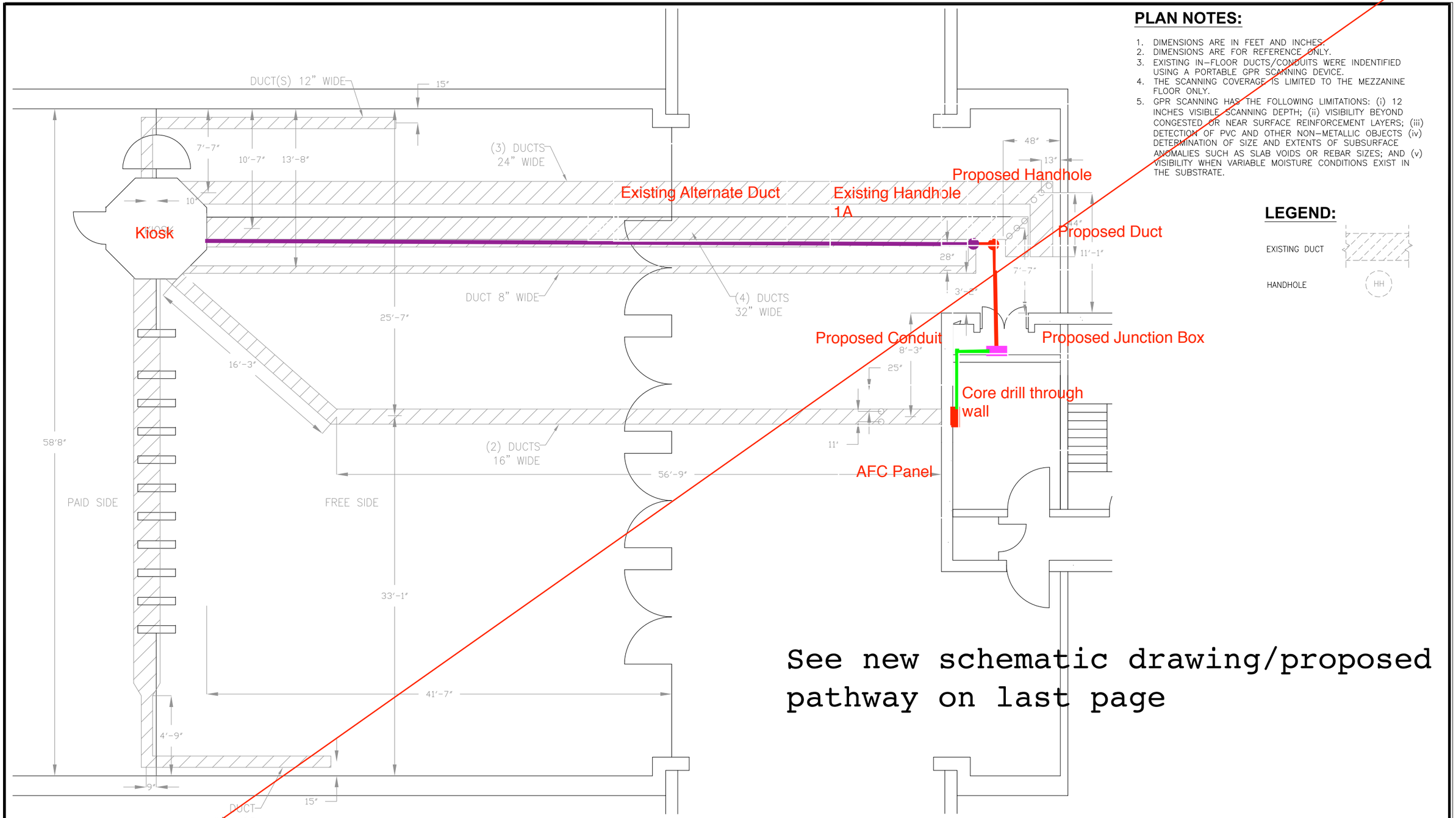
HARRY WEESE & ASSOCIATES
GENERAL ARCHITECTURAL CONSULTANT ■

VIENNA STATION
AFC EQUIPMENT LAYOUT

SCALE 0 2 4 6 8 10

DRAWING NO. AC-3706

103



1 E-100 VIENNA STATION
SCALE: NOT TO SCALE

PLAN NOTES:

1. DIMENSIONS ARE IN FEET AND INCHES.
2. DIMENSIONS ARE FOR REFERENCE ONLY.
3. EXISTING IN–FLOOR DUCTS/CONDUITS WERE INDENTIFIED USING A PORTABLE GPR SCANNING DEVICE.
4. THE SCANNING COVERAGE IS LIMITED TO THE MEZZANINE FLOOR ONLY.
5. GPR SCANNING HAS THE FOLLOWING LIMITATIONS: (i) 12 INCHES VISIBLE SCANNING DEPTH; (ii) VISIBILITY BEYOND CONGESTED OR NEAR SURFACE REINFORCEMENT LAYERS; (iii) DETECTION OF PVC AND OTHER NON–METALLIC OBJECTS (iv) DETERMINATION OF SIZE AND EXTENTS OF SUBSURFACE ANOMALIES SUCH AS SLAB VOIDS OR REBAR SIZES; AND (v) VISIBILITY WHEN VARIABLE MOISTURE CONDITIONS EXIST IN THE SUBSTRATE.

LEGEND:

EXISTING DUCT

HANDHOLE HH

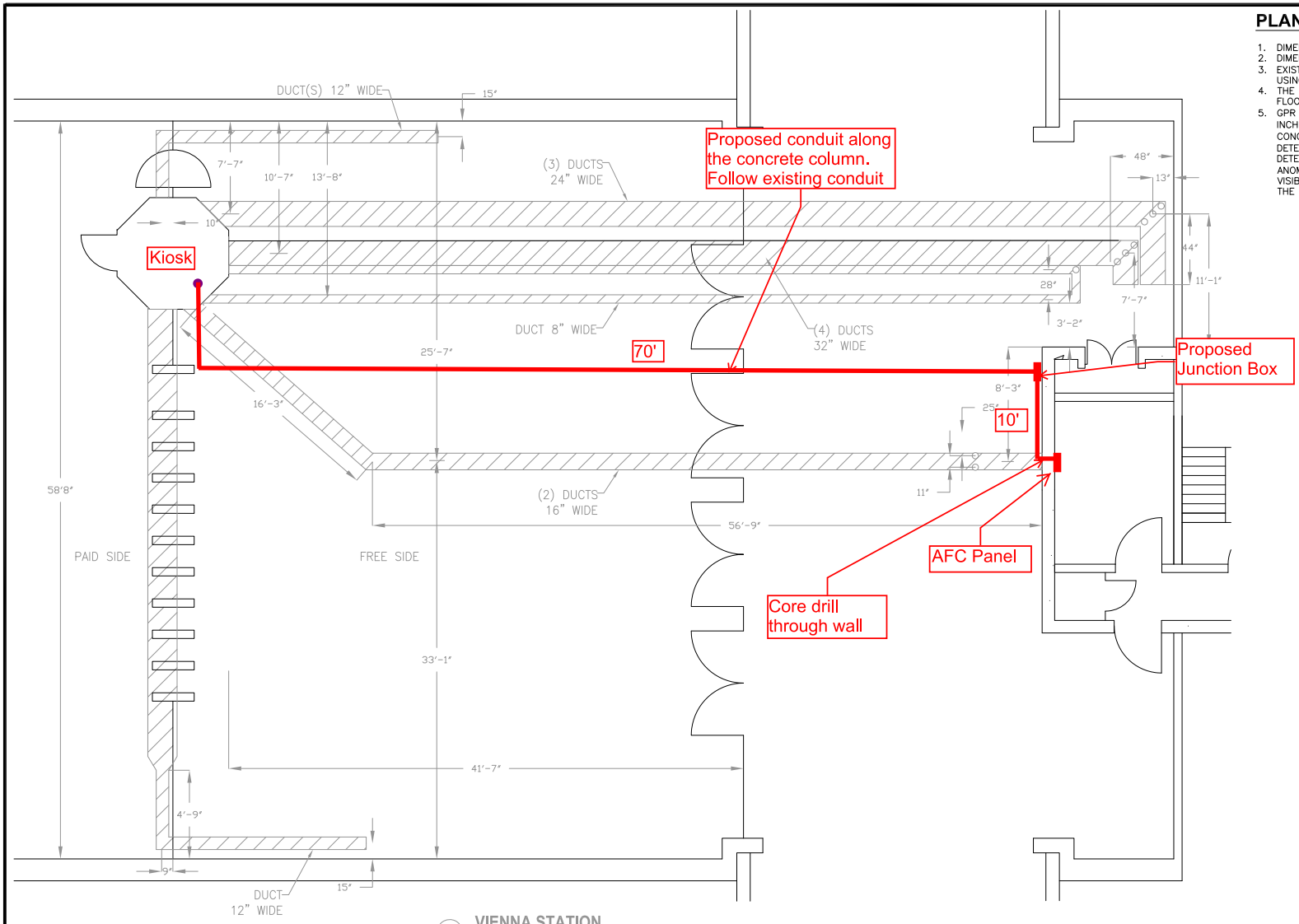
See new schematic drawing/proposed pathway on last page

CONTRACT NO. XXXXXX

DESIGNED C. LOOSE 03–15 DATE	REFERENCE DRAWINGS: NUMBER, DESCRIPTION	REVISIONS: DATE, BY, DESCRIPTION	WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY
DRAWN C. LOOSE 03–15 DATE			DEPARTMENT OF TRANSIT INFRASTRUCTURE AND ENGINEERING SERVICES OFFICE OF INFRASTRUCTURE RENEWAL PROGRAM
CHECKED M. BUTLER 03–15 DATE			APPROVED _____
APPROVED _____ DATE			GFP A Gannett Fleming/Parsons JOINT VENTURE SUBMITTED _____ PROJECT MANAGER

15-NEPP-01
IN - FLOOR DUCT INSPECTIONS
K08 Vienna
PROPOSED POWER ROUTE

SCALE	DRAWING NO.	
NOT TO SCALE	K08–E–100	XXX



1 E-100 VIENNA STATION
SCALE: NOT TO SCALE

PLAN NOTES:

1. DIMENSIONS ARE IN FEET AND INCHES.
2. DIMENSIONS ARE FOR REFERENCE ONLY.
3. EXISTING IN-FLOOR DUCTS/CONDUITS WERE INDENTIFIED USING A PORTABLE GPR SCANNING DEVICE.
4. THE SCANNING COVERAGE IS LIMITED TO THE MEZZANINE FLOOR ONLY.
5. GPR SCANNING HAS THE FOLLOWING LIMITATIONS: (i) 12 INCHES VISIBLE SCANNING DEPTH; (ii) VISIBILITY BEYOND CONGESTED OR NEAR SURFACE REINFORCEMENT LAYERS; (iii) DETECTION OF PVC AND OTHER NON-METALLIC OBJECTS (iv) DETERMINATION OF SIZE AND EXTENTS OF SUBSURFACE ANOMALIES SUCH AS SLAB VOIDS OR REBAR SIZES; AND (v) VISIBILITY WHEN VARIABLE MOISTURE CONDITIONS EXIST IN THE SUBSTRATE.

LEGEND:

EXISTING DUCT

HANDHOLE HH

CONTRACT NO. XXXXXX

DESIGNED C. LOOSE	03-15 DATE	
DRAWN C. LOOSE	03-15 DATE	
CHECKED M. BUTLER	03-15 DATE	
APPROVED	DATE	

REFERENCE DRAWINGS	
NUMBER	DESCRIPTION

REVISIONS		
DATE	BY	DESCRIPTION

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY

DEPARTMENT OF TRANSIT INFRASTRUCTURE AND ENGINEERING SERVICES
OFFICE OF INFRASTRUCTURE RENEWAL PROGRAM

APPROVED

GFP A Gannett Fleming/Parsons JOINT VENTURE

SUBMITTED
PROJECT MANAGER

15-NEPP-01
IN - FLOOR DUCT INSPECTIONS
K08 Vienna
PROPOSED POWER ROUTE

SCALE	DRAWING NO.	
NOT TO SCALE	K08-E-100	XXX