



JUMPER CARTER SEASE/ARCHITECTS, P.A. 412 MEETING STREET, WEST COLUMBIA, SOUTH CAROLINA 29169 (803) 791-1020 (803) 791-1022 FAX

UNIVERSITY OF SOUTH CAROLINA

NEW FIRE ALARM SYSTEM FOR JAMES F. BYRNES BUILDING

USC PROJECT NO: H27-I851-A JCS PROJECT NO: 11104

ADDENDUM 01 June 1, 2012

GENERAL:

- 1. Revise project number on all documents and drawings to read "H27-I851-A".
- 2. The meeting minutes from the Pre-Bid Conference on May 23, 2012, are included in this addendum.
- 3. See attached addendum documents provided by Sims Group Engineers for revisions to fire alarm design.
- 4. See attached HazMat Survey provided by USC for report of asbestos-containing materials for this building. All penetrations through asbestos-containing materials shall be marked by the contractor for removal by USC under separate contract.

SPECIFICATIONS:

- 1. SE310 Request for Advertisement/Invitation For Bids. Revise Construction Cost Range to read "\$100,000 to \$300,000".
- 2. SE 330 Standard Bid Form. Replace form in its entirety with the attached revised form, with revised project number.
- 3. SE 355 Performance Bond. Replace form in its entirety with the attached revised form, with revised project number.
- 4. SE 357 Labor and Material Payment Bond. Replace form in its entirety with the attached revised form, with revised project number.

END OF ADDENDUM



JUMPER CARTER SEASE/ARCHITECTS, P.A. 412 MEETING STREET * WEST COLUMBIA, SOUTH CAROLINA 29169 (803) 791-1020 * (803) 791-1022 FAX

NEW FIRE ALARM SYSTEM FOR JAMES F. BYRNES BUILDING

UNIVERSITY OF SOUTH CAROLINA

USC PROJECT NO: H27-I851-A JCS PROJECT NO: 11104

PRE-BID CONFERENCE MINUTES MAY 23, 2012, 2:00 pm

- 1. The Pre-Bid Conference is non-mandatory.
- 2. Bids will be due Wednesday, June 6, 2012, at 2:00 pm at 743 Greene St, Columbia SC. Bids received after that time will not be accepted. Contact Juaquana Brookins at USC (803)-777-3596 if bids will be delivered other than in person (by mail, etc.).
- 3. All testing and special inspections will be provided by Owner's testing agency.
- 4. All bids must be submitted on SE-330 Bid Form as provided in the project manual. A bid bond will be required with the bid.
- 5. There is currently a single base bid required on the bid form.
- 6. There are no unit prices required on the bid form.
- 7. There are no subcontractors required to be listed on the bid form.
- 8. There will be at least one addendum issued for this project. The final addendum will be issued by Friday, June 1, 2012.
- 9. A brief description of the project was given by the electrical engineer (Brian Boan, Sims Group Engineers).
- 10. The building is occupied by students and staff. No fraternization or contact with students or staff will be allowed.
- 11. The building is open during normal business hours, but not all spaces are unlocked. The contractor may arrange a site visit with the USC project manager, Pete Fisher at (803) 777-9346.
- 12. Toilets facilities in the building will be made available to the contractors.

END OF MINUTES

$\begin{array}{c} \textbf{SE-330} - \textbf{LUMP SUM BID} \\ \textbf{BID FORM} \end{array}$

Bidders shall submit bids on only Bid Form SE-330.
BID SUBMITTED BY:
(Bidder's Name)
BID SUBMITTED TO: University of South Carolina
(Owner's Name)
FOR PROJECT: PROJECT NAME New Fire Alarm System for James F. Byrnes Building
PROJECT NUMBER <u>H27-I851-A</u>
<u>OFFER</u>
§ 1. In response to the Invitation for Construction Bids and in compliance with the Instructions to Bidders for the above-named Project, the undersigned Bidder proposes and agrees, if this Bid is accepted, to enter into a Contract with the Owner on the terms included in the Bidding Documents, and to perform all Work as specified or indicated in the Bidding Documents, for the prices and within the time frames indicated in this Bid and in accordance with the other terms and conditions of the Bidding Documents. § 2. Pursuant to Section 11-32-3030(1) of the SC Code of Laws, as amended, Bidder has submitted Bid Security as follows in the amount and form required by the Bidding Documents:
☐ Bid Bond with Power of Attorney ☐ Electronic Bid Bond ☐ Cashier's Check (Bidder check one)
§ 3. Bidder acknowledges the receipt of the following Addenda to the Bidding Documents and has incorporated the effects of said Addenda into this Bid:
ADDENDUM No:
§ 4. Bidder accepts all terms and conditions of the Invitation for Bids, including, without limitation, those dealing with the disposition of Bid Security. Bidder agrees that this Bid, including all Bid Alternates, if any, may not be revoked or withdrawn after the opening of bids, and shall remain open for acceptance for a period of 60 Days following the Bid Date, or for such longer period of time that Bidder may agree to in writing upon request of the Owner.
§ 5. Bidder herewith offers to provide all labor, materials, equipment, tools of trades and labor, accessories appliances, warranties and guarantees, and to pay all royalties, fees, permits, licenses and applicable taxes necessary to complete the following items of construction work:
§ 6.1 BASE BID WORK (as indicated in the Bidding Documents and generally described as follows): Project includes
installation of new fire alarm system for the James F. Byrnes Building per the contract documents. The existing
system will remian in place and functional while the new system is installed, then demolished. Small and minority participation is encouraged
, which sum is hereafter called the Base Bid. (Bidder - insert Base Bid Amount on line above)

$\begin{array}{c} \textbf{SE-330} - \textbf{LUMP SUM BID} \\ \textbf{BID FORM} \end{array}$

§ 6.2 BID ALTERNATES - as indicated in the Bidding Documents and generally described as follows
ALTERNATE # 1 (Brief Description):
ADD TO or DEDUCT FROM BASE BID:
(Bidder to Mark appropriate box to clearly indicate the price adjustment offered for each alternate)
ALTERNATE # 2 (Brief Description): ADD TO or DEDUCT FROM BASE BID: (Bidder to Mark appropriate box to clearly indicate the price adjustment offered for each alternate)
ALTERNATE # 3 (Brief Description):
ADD TO or DEDUCT FROM BASE BID:
(Bidder to Mark appropriate box to clearly indicate the price adjustment offered for each alternate)

SE-330 – LUMP SUM BID BID FORM

§ 7. LISTING OF PROPOSED SUBCONTRACTORS PURSUANT TO SECTION 3020(b)(i), CHAPTER 35, TITLE 11 OF THE SOUTH CAROLINA CODE OF LAWS, AS AMENDED – (See Instructions on the following page BF-4A)

Bidder shall use the below-listed Subcontractors in the performance of the Subcontractor Specialty work listed:

SUBCONTRACTOR SPECIALTY By License Classification and/or Subclassification (Completed by Owner)	SUBCONTRACTOR'S PRIME CONTRACTOR'S NAME (Must be completed by Bidder) BASE BID	SUBCONTRACTOR'S PRIME CONTRACTOR'S SC LICENSE NUMBER
	ALTERNATE 1	
	ALTERNATE 2	
	ALTERNATE 3	
		·

If a Bid Alternate is accepted, Subcontractors listed for the Bid Alternate shall be used for the work of both the Alternate and the Base Bid work.

SE-330 – LUMP SUM BID BID FORM

INSTRUCTIONS FOR SUBCONTRACTOR LISTING

- 1. Section 7 of the Bid Form sets forth a list of subcontractor specialties for which bidder is required to identify by name the subcontractor(s) Bidder will use to perform the work of each listed specialty. Bidder must identify only the subcontractor(s) who will perform the work and no others.
- 2. For purposes of subcontractor listing, a Subcontractor is an entity who will perform work or render service to the prime contractor to or about the construction site. Material suppliers, manufacturers, and fabricators that will not perform physical work at the site of the project but will only supply materials or equipment to the bidder or proposed subcontractor(s) are not subcontractors and Bidder should not insert their names in the spaces provided on the bid form. Likewise, Bidder should not insert the names of sub-subcontractors in the spaces provided on the bid form but only the names of those entities with which bidder will contract directly.
- 3. Bidder must only insert the names of subcontractors who are qualified to perform the work of the listed specialties as specified in the Bidding Documents and South Carolina Licensing Laws.
- **4.** If under the terms of the Bidding Documents, Bidder is qualified to perform the work of a specialty listed and Bidder does not intend to subcontract such work but to use Bidder's own employees to perform such work, the Bidder must insert its own name in the space provided for that specialty.
- **5.** If Bidder intends to use multiple subcontractors to perform the work of a single specialty listing, Bidder must insert the name of each subcontractor Bidder will use, preferably separating the name of each by the word "and". If Bidder intends to use both his own employees to perform a part of the work of a single specialty listing and to use one or more subcontractors to perform the remaining work for that specialty listing, bidder must insert his own name and the name of each subcontractor, preferably separating the name of each with the word "and".
- 6. Bidder may not list subcontractors in the alternative nor in a form that may be reasonably construed at the time of bid opening as a listing in the alternative. A listing that requires subsequent explanation to determine whether or not it is a listing in the alternative is non-responsive. If bidder intends to use multiple entities to perform the work for a single specialty listing, bidder must clearly set forth on the bid form such intent. Bidder may accomplish this by simply inserting the word "and" between the name of each entity listed for that specialty. Owner will reject as non-responsive a listing that contains the names of multiple subcontractors separated by a blank space, the word "or", a virgule (that is a /), or any separator that the Owner may reasonably interpret as a listing in the alternative.
- **7.** If Bidder is awarded the contract, bidder must, except with the approval of the owner for good cause shown, use the listed entities to perform the work for which they are listed.
- 8. If bidder is awarded the contract, bidder will not be allowed to substitute another entity as subcontractor in place of a subcontractor listed in Section 7 of the Bid except for one or more of the reasons allowed by the SC Code of Laws.
- 9. Bidder's failure to insert a name for each listed specialty subcontractor will render the Bid non-responsive.

SE-330 – LUMP SUM BID BID FORM

§ 8. LIST OF MANUFACTURERS, MATERIAL SUPPLIERS, AND SUBCONTRACTORS OTHER THAN SUBCONTRACTORS LISTED IN SECTION 7 ABOVE (FOR INFORMATION ONLY): Pursuant to instructions in the Invitation for Bids, if any, Bidder will provide to Owner upon the Owner's request and within 24 hours of such request, a listing of manufacturers, material suppliers, and subcontractors, other than those listed in Section 7 above, that Bidder intends to use on the project. Bidder acknowledges and agrees that this list is provided for purposes of determining responsibility and not pursuant to the subcontractor listing requirements of SC Code Ann § 11-35-3020(b)(i).

§ 9. TIME OF CONTRACT PERFORMANCE AND LIQUIDATED DAMAGES

- a. CONTRACT TIME: Bidder agrees that the Date of Commencement of the Work shall be established in a Notice to Proceed to be issued by the Owner. Bidder agrees to substantially complete the Work within <u>180</u> calendar days from the Date of Commencement, subject to adjustments as provided in the Contract Documents.
- b. LIQUIDATED DAMAGES: Bidder further agrees that from the compensation to be paid, the Owner shall retain as Liquidated Damages the sum of \$250.00 for each calendar day the actual construction time required to achieve Substantial Completion exceeds the specified or adjusted time for Substantial Completion as provided in the Contract Documents. This sum is intended by the parties as the predetermined measure of compensation for actual damages, not as a penalty for nonperformance.

§ 10. AGREEMENTS

- a. Bidder agrees that this bid is subject to the requirements of the law of the State of South Carolina.
- b. Bidder agrees that at any time prior to the issuance of the Notice to Proceed for this Project, this Project may be canceled for the convenience of, and without cost to, the State.
- c. Bidder agrees that neither the State of South Carolina nor any of its agencies, employees or agents shall be responsible for any bid preparation costs, or any costs or charges of any type, should all bids be rejected or the Project canceled for any reason prior to the issuance of the Notice to Proceed.

§ 11. ELECTRONIC BID BOND

By signing below, the Principal is affirming that the identified electronic bid bond has been executed and that the Principal and Surety are firmly bound unto the State of South Carolina under the terms and conditions of the AIA Document A310, Bid Bond, included in the Bidding Documents.

Electronic Bid Bond Number	
Signature and Title:	

SE-330 – LUMP SUM BID

BID FORM	
BIDDER'S TAXPAYER IDENTIFICATION	
FEDERAL EMPLOYER'S IDENTIFICATION NUMBER:	
OR	
SOCIAL SECURITY NUMBER:	
CONTRACTOR'S CLASSIFICATIONS AND SUBCLASSIFICATIONS WITH LIMITATIONS	
Classification(s)& Limits:	
Subclassification(s) & Limits:	
SC Contractor's License Number(s):	
BY SIGNING THIS BID, THE PERSON SIGNING REAFFIRMS ALL REPRESENTATIONS AN CERTIFICATIONS MADE BY BOTH THE PERSON SIGNING AND THE BIDDER, INCLUDING WITHOU LIMITATION, THOSE APPEARING IN ARTICLE 2 OF THE INSTRUCTIONS TO BIDDER. THE INVITATION FOR BIDS, AS DEFINED IN THE INSTRUCTIONS TO BIDDERS, IS EXPRESSI INCORPORATE BY REFERENCE.	J' H
SIGNATURE	
BIDDER'S LEGAL NAME:	
ADRESS:	
BY: DATE:	
(Signature)	

TELEPHONE:

EMAIL: _____

SE-355

Performance Bond

KNOW ALL MEN BY THESE PRESENTS, that (Insert	t full name or legal title and address of Contractor)
Name: Address:	
hereinafter referred to as "Contractor", and (Insert full name Name: Address:	and address of principal place of business of Surety)
hereinafter called the "surety", are jointly and severally he Name: Address:	eld and firmly bound unto (Insert full name and address of Agency)
	ssigns, the sum of (\$), being the sum of the ntractor and Surety bind themselves, their heirs, executors, ly, firmly by these presents.
WHEREAS, Contractor has by written agreement dated _	entered into a contract with Agency to construct
State Project Name: New Fire Alarm System for	James F. Byrnes Building
new fire alarm system for the James F. Byrnes Br	the SE-330, Bid Form: Project includes installation of uilding per the contract documents. The existing system y system is installed, then demolished. Small and minority
in accordance with Drawings and Specifications prepared	by (Insert full name and address of A/E)
Name: <u>Jumper Carter Sease Architects</u> Address: <u>412 Meeting Street</u> West Columbia, SC 29169	
which agreement is by reference made a part hereof, and i	s hereinafter referred to as the Contract.
	ading to be legally bound hereby, subject to the terms stated vexecuted on its behalf by its authorized officer, agent or
DATED thisday of, 2BO	ND NUMBER
CONTRACTOR	SURETY
Ву:	By:
(Seal)	(Seal)
Print Name:	Print Name:
Print Title:	Print Title:(Attach Power of Attorney)
Witness:	Witness:

(Additional Signatures, if any, appear on attached page)

Performance Bond

NOW, THEREFORE, THE CONDITION OF THIS OBLIGATION IS SUCH THAT:

- 1. The Contractor and the Surety, jointly and severally, bind themselves, their heirs, executors, administrators, successors and assigns to the Agency for the full and faithful performance of the contract, which is incorporated herein by reference
- 2. If the Contractor performs the contract, the Surety and the Contractor have no obligation under this Bond, except to participate in conferences as provided in paragraph 3.1.
- **3.** The Surety's obligation under this Bond shall arise after:
- **3.1** The Agency has notified the Contractor and the Surety at the address described in paragraph 10 below, that the Agency is considering declaring a Contractor Default and has requested and attempted to arrange a conference with the Contractor and the Surety to be held not later than 15 days after receipt of such notice to discuss methods of performing the Contract. If the Agency, the Contractor and the Surety agree, the Contractor shall be allowed a reasonable time to perform the Contract, but such an agreement shall not waive the Agency's right, if any, subsequently to declare a Contractor Default; or
- **3.2** The Agency has declared a Contractor Default and formally terminated the Contractor's right to complete the Contract.
- **4.** The Surety shall, within 15 days after receipt of notice of the Agency's declaration of a Contractor Default, and at the Surety's sole expense, take one of the following actions:
- **4.1** Arrange for the Contractor, with consent of the Agency, to perform and complete the Contract; or
- **4.2** Undertake to perform and complete the Contract itself, through its agents or through independent contractors; or
- **4.3** Obtain bids or negotiated proposals from qualified contractors acceptable to the Agency for a contract for performance and completion of the Contract, arrange for a contract to be prepared for execution by the Agency and the contractor selected with the Agency's concurrence, to be secured with performance and payment bonds executed by a qualified surety equivalent to the Bonds issued on the Contract, and pay to the Agency the amount of damages as described in paragraph 7 in excess of the Balance of the Contract Sum incurred by the Agency resulting from the Contractor Default; or
- **4.4** Waive its right to perform and complete, arrange for completion, or obtain a new contractor, and:
- **4.4.1** After investigation, determine the amount for which it may be liable to the Agency and, within 60 days of waiving its rights under this paragraph, tender payment thereof to the Agency; or
- **4.4.2** Deny liability in whole or in part and notify the Agency, citing the reasons therefore.
- **5.** Provided Surety has proceeded under paragraphs 4.1, 4.2, or 4.3, the Agency shall pay the Balance of the Contract Sum to either:
- **5.1** Surety in accordance with the terms of the Contract; or
- **5.2** Another contractor selected pursuant to paragraph 4.3 to perform the Contract.
- **5.3** The balance of the Contract Sum due either the Surety or another contractor shall be reduced by the amount of damages as described in paragraph 7.
- **6.** If the Surety does not proceed as provided in paragraph 4 with reasonable promptness, the Surety shall be deemed to be in default on this Bond 15 days after receipt of written notice from the Agency to the Surety demanding that the Surety perform its obligations under this Bond, and the Agency shall be entitled to enforce any remedy available to the Agency.

- **6.1** If the Surety proceeds as provided in paragraph 4.4, and the Agency refuses the payment tendered or the Surety has denied liability, in whole or in part, then without further notice the Agency shall be entitled to enforce any remedy available to the Agency.
- **6.2** Any dispute, suit, action or proceeding arising out of or relating to this Bond shall be governed by the Dispute Resolution process defined in the Contract Documents and the laws of the State of South Carolina.
- 7. After the Agency has terminated the Contractor's right to complete the Contract, and if the Surety elects to act under paragraph 4.1, 4.2, or 4.3 above, then the responsibilities of the Surety to the Agency shall be those of the Contractor under the Contract, and the responsibilities of the Agency to the Surety shall those of the Agency under the Contract. To a limit of the amount of this Bond, but subject to commitment by the Agency of the Balance of the Contract Sum to mitigation of costs and damages on the Contract, the Surety is obligated to the Agency without duplication for:
- **7.1** The responsibilities of the Contractor for correction of defective Work and completion of the Contract; and
- **7.2** Additional legal, design professional and delay costs resulting from the Contractor's Default, and resulting from the actions or failure to act of the Surety under paragraph 4; and
- **7.3** Damages awarded pursuant to the Dispute Resolution Provisions of the Contract. Surety may join in any Dispute Resolution proceeding brought under the Contract and shall be bound by the results thereof; and
- **7.4** Liquidated Damages, or if no Liquidated Damages are specified in the Contract, actual damages caused by delayed performance or non-performance of the Contractor.
- 8. The Surety shall not be liable to the Agency or others for obligations of the Contractor that are unrelated to the Contract, and the Balance of the Contract Sum shall not be reduced or set-off on account of any such unrelated obligations. No right of action shall accrue on this Bond to any person or entity other than the Agency or its heirs, executors, administrators, or successors.
- **9.** The Surety hereby waives notice of any change, including changes of time, to the contract or to related subcontracts, purchase orders and other obligations.
- **10.** Notice to the Surety, the Agency or the Contractor shall be mailed or delivered to the address shown on the signature page.
- 11. Definitions
- 11.1 Balance of the Contract Sum: The total amount payable by the Agency to the Contractor under the Contract after all proper adjustments have been made, including allowance to the Contractor of any amounts to be received by the Agency in settlement of insurance or other Claims for damages to which the Contractor is entitled, reduced by all valid and proper payments made to or on behalf of the Contractor under the Contract.
- **11.2** Contractor Default: Failure of the Contractor, which has neither been remedied nor waived, to perform the Contract or otherwise to comply with the terms of the Contract.

2011 Edition

SE-357 <u>Labor and Material Payment Bond</u>

Rev. 8/9/2011

KNOW ALL MEN BY THESE PRESENTS, that (Insert	full name or legal title and address of Contractor)
Name:Address:	
hereinafter referred to as "Contractor", and (Insert full name of Name: Address:	and address of principal place of business of Surety)
	ld and firmly bound unto (Insert full name and address of Agency)
WHEREAS, Contractor has by written agreement dated _	entered into a contract with Agency to construct
Project Name: New Fire Alarm System for James	s F. Byrnes Building
new fire alarm system for the James F. Byrnes Bu	the SE-330, Bid Form: Project includes installation of milding per the contract documents. The existing system system is installed, then demolished. Small and minority
in accordance with Drawings and Specifications prepared	by (Insert full name and address of A/E)
Name: <u>Jumper Carter Sease Architects</u> Address: <u>412 Meeting Street</u> West Columbia, SC 29169	
which agreement is by reference made a part hereof, and is	s hereinafter referred to as the Contract.
	ding to be legally bound hereby, subject to the terms stated Bond to be duly executed on its behalf by its authorized
DATED thisday of, 2 BOI	ND NUMBER
CONTRACTOR	SURETY
By:(Seal)	By:(Seal)
(Seal)	(Scar)
Print Name:	Print Name:
Print Title:	Print Title:(Attach Power of Attorney)
Witness:	Witness:
(Additional Signatures, if any, appear on attached page)	

SE-357 Rev. 8/9/2011

Labor and Material Payment Bond

NOW, THEREFORE, THE CONDITION OF THIS OBLIGATION IS SUCH THAT:

- 1. The Contractor and the Surety, jointly and severally, bind themselves, their heirs, executors, administrators, successors and assigns to the Agency to pay for all labor, materials and equipment required for use in the performance of the Contract, which is incorporated herein by reference.
- 2. With respect to the Agency, this obligation shall be null and void if the Contractor:
- **2.1** Promptly makes payment, directly or indirectly, for all sums due Claimants; and
- **2.2** Defends, indemnifies and holds harmless the Agency from all claims, demands, liens or suits by any person or entity who furnished labor, materials or equipment for use in the performance of the Contract.
- 3. With respect to Claimants, this obligation shall be null and void if the Contractor promptly makes payment, directly or indirectly, for all sums due.
- **4.** With respect to Claimants, and subject to the provisions of Title 29, Chapter 5 and the provisions of §11-35-3030(2)(c) of the SC Code of Laws, as amended, the Surety's obligation under this Bond shall arise as follows:
- **4.1** Every person who has furnished labor, material or rental equipment to the Contractor or its subcontractors for the work specified in the Contract, and who has not been paid in full therefore before the expiration of a period of ninety (90) days after the date on which the last of the labor was done or performed by him or material or rental equipment was furnished or supplied by him for which such claim is made, shall have the right to sue on the payment bond for the amount, or the balance thereof, unpaid at the time of institution of such suit and to prosecute such action for the sum or sums justly due him.
- **4.2** A remote claimant shall have a right of action on the payment bond upon giving written notice by certified or registered mail to the Contractor within ninety (90) days from the date on which such person did or performed the last of the labor or furnished or supplied the last of the material or rental equipment upon which such claim is made.
- **4.3** Every suit instituted upon a payment bond shall be brought in a court of competent jurisdiction for the county or circuit in which the construction contract was to be performed, but no such suit shall be commenced after the expiration of o ne year after the day on which the last of the labor was performed or material or rental equipment was supplied by the person bringing suit.
- **5.** When the Claimant has satisfied the conditions of paragraph 4, the Surety shall promptly and at the Surety's expense take the following actions:
- **5.1** Send an answer to the Claimant, with a copy to the Agency, within sixty (60) days after receipt of the claim, stating the amounts that are undisputed and the basis for challenging any amounts that are disputed.
- **5.2** Pay or arrange for payment of any undisputed amounts.
- **5.3** The Surety's failure to discharge its obligations under this paragraph 5 shall not be deemed to constitute a waiver of defenses the Surety or Contractor may have or acquire as to a claim. However, if the Surety fails to discharge its obligations under this paragraph 5, the Surety shall indemnify the Claimant for the reasonable attorney's fees the Claimant incurs to recover any sums found to be due and owing to the Claimant.
- 6. Amounts owed by the Agency to the Contractor under the

- Contract shall be used for the performance of the Contract and to satisfy claims, if any, under any Performance Bond. By the Contractor furnishing and the Agency accepting this Bond, they agree that all funds earned by the contractor in the performance of the Contract are dedicated to satisfy obligations of the Contractor and the Surety under this Bond, subject to the Agency's prior right to use the funds for the completion of the Work.
- 7. The Surety shall not be liable to the Agency, Claimants or others for obligations of the Contractor that are unrelated to the Contract. The Agency shall not be liable for payment of any costs or expenses of any claimant under this bond, and shall have under this Bond no obligations to make payments to, give notices on behalf of, or otherwise have obligations to Claimants under this Bond.
- **8.** The Surety hereby waives notice of any change, including changes of time, to the Contract or to related Subcontracts, purchase orders and other obligations.
- 9. Notice to the Surety, the Agency or the Contractor shall be mailed or delivered to the addresses shown on the signature page. Actual receipt of notice by Surety, the Agency or the contractor, however accomplished, shall be sufficient compliance as of the date received at the address shown on the signature page.
- 10. By the Contractor furnishing and the Agency accepting this Bond, they agree that this Bond has been furnished to comply with the statutory requirements of the South Carolina Code of Laws, as amended, and further, that any provision in this Bond conflicting with said statutory requirements shall be deemed deleted herefrom and provisions conforming to such statutory or other legal requirement shall be deemed incorporated herein. The intent is that this Bond shall be construed as a statutory Bond and not as a common law bond.
- 11. Upon request of any person or entity appearing to be a potential beneficiary of this bond, the Contractor shall promptly furnish a copy of this Bond or shall permit a copy to be made.
- 12. Any dispute, suit, action or proceeding arising out of or relating to this Bond shall be governed by the laws of the State of South Carolina.

13. DEFINITIONS

- 13.1 Claimant: An individual or entity having a direct contract with the Contractor or with a Subcontractor of the Contractor to furnish labor, materials, or equipment for use in the performance of the Contract. The intent of this Bond shall be to include without limitation in the terms "labor, materials or equipment" that part of water, gas, power, light, heat, oil, gasoline, telephone service or rental equipment used in the Contract, architectural and engineering services required for performance of the Work of the Contractor and the Contractor's Subcontractors, and all other items for which a mechanic's lien might otherwise be asserted.
- **13.2** Remote Claimant: A person having a direct contractual relationship with a subcontractor of the Contractor or subcontractor, but no contractual relationship expressed or implied with the Contractor.
- **13.3** Contract: The agreement between the Agency and the Contractor identified on the signature page, including all Contract Documents and changes thereto.



800 Columbiana Drive, Suite 208 • Irmo, SC • 29063 • 803-765-1007 • www.simsgroupusa.com

NEW FIRE ALARM SYSTEMFOR JAMES F. BYRNES BUILDING

ELECTRICAL ITEMS - ADDENDUM NO. 1 June 1, 2012

This addendum modifies the Contract Documents only in the manner and to the extent stated herein and shown on any accompanying drawings and will become a part of the Contract Documents. Except as specified or otherwise indicated by this addendum, all work shall be in accordance with the basic requirements of the Contract Documents.

SPECIFICATIONS:

1. <u>SECTION 283100 - FIRE ALARM SYST</u>EMS:

- Section 2-01 Acceptable Manufacturers: Add the following to list of approved manufacturers:
 - 1. Edwards/EST EST 3 Series

DRAWINGS:

2. **SHEET E001**:

 See attached drawing for Revision 2, dated 5/31/12 for addition of Mass Communication requirements and installations.

QUESTIONS/CLARIFICATIONS:

1. Will evacuation on Alarm be general for the entire building or Floor above and Below?

Per USC Fire Department, unless instructed otherwise during programming stage, alarm shall be general for the entire building.

2. On the 4th Floor there is no access above ceiling tile due to sheet rock installation. Will this floor be all exposed WireMold Raceway?

In all areas where conduit cannot be concealed above ceiling or in walls (except for storage rooms, electrical rooms, basement, etc), Fire Alarm wiring shall be concealed in Wiremold (or equal) surface mounted raceway. Locations will be coordinated in the field.

Each Bidder shall acknowledge receipt of this Addendum and all other Addenda on his bid form.

FIRE ALARM SYSTEM NOTES

- ALL FIRE ALARM SYSTEM WIRING SHALL BE RUN ABOVE GRADE IN WALLS AND ABOVE CEILING IN METAL RACEWAYS. RACEWAYS SHALL BE RUN CONCEALED WHERE PRACTICAL. FIRE ALARM WIRING MAY NOT BE RUN UNDERGROUND OR IN SLAB UNLESS SPECIFICALLY NOTED OTHERWISE ON THE DRAWINGS.
- VERIFY WIRING REQUIREMENTS WITH EQUIPMENT MFR PRIOR TO ROUGH—IN AND INSTALL ACCORDINGLY. NOTIFICATION APPLIANCE CIRCUITS SHALL BE RUN AS REQ'D TO PROVIDE A 3-PULSE TEMPORAL AUDIBLE SIGNAL WITHOUT COMPROMISING THE OPERATION OF THE STROBES.
- 3. PROVIDE SYNCHRONIZATION OF ALL STROBE LIGHTS.
- . FIRE ALARM SYSTEM TO BE CLASS B SUPERVISED SYSTEM (STYLE B INITIATING DEVICE CIRCUITS, STYLE 4 SIGNALING LINE CIRCUITS, CLASS B NOTIFICATION APPLIANCE CIRCUITS). FURNISH & INSTALL END-OF-LINE RESISTORS WHERE REQ'D. ONLY SPLICES ALLOWED ARE TO BE LOCATED IN RISER BOXES ONLY. SPLICES SHALL BE MADE WITH THE USE OF WIRE TERMINALS AND NOT WIRE NUTS.
- EQUIPMENT SUPPLIER SHALL SUBMIT SHOP DRAWINGS INDICATING EXACT ROUTING OF RACEWAYS AND NUMBER AND SIZE OF CONDUCTORS IN RACEWAYS FOR THE FIRE ALARM SYSTEM. THE ELECTRICAL CONTRACTOR SHALL USE THE REVIEWED DRAWING FOR ROUGH-IN OF FIRE ALARM SYSTEM RACEWAYS AND OUTLET BOXES.
- SMOKE DETECTORS SHALL BE LOCATED AS NEAR THE CENTER OF THE ROOM AS PRACTICAL. DO NOT LOCATE ANY DETECTOR WITHIN 3-FT. OF AN HVAC SUPPLY GRILLE. PROVIDE AUXILIARY CONTACT ON SMOKE DETECTORS LOCATED IN CORRIDORS AT SMOKE DOORS. WIRE MAGNETIC DOOR HOLDERS THRU AUXILIARY CONTACT TO RELEASE DOOR WHEN THOSE DETECTORS ARE ACTUATED. SMOKE DETECTORS SHALL BE PROGRAMMED FOR A 60 SECOND VERIFICATION BEFORE GOING INTO ALARM.
- . DUCT DETECTORS SHALL BE FURNISHED BY THE FIRE ALARM SYSTEM SUPPLIER AND INSTALLED BY A QUALIFIED HVAC TECHNICIAN UNDER DIVISION 28. FIRE ALARM SYSTEM WIRING WILL FURNISHED & INSTALLED BE BY THE FIRE ALARM SYSTEM SUPPLIER UNDER DIVISION 28. HVAC CONTROL WIRING WILL BE FURNISHED & INSTALLED BY THE MECHANICAL CONTRACTOR UNDER DIVISION 28. PROVIDE AUXILIARY CONTACT WITH EACH DUCT DETECTOR FOR USE BY HVAC CONTROLS.
 - DUCT DETECTORS TO BE LOCATED AND INSTALLED IN STRICT ACCORDANCE WITH THE MANUFACTURER'S INSTALLATION INSTRUCTIONS. COORDINATE THE LOCATION OF EACH DUCT DETECTOR IN THE FIELD WITH THE MECHANICAL CONTRACTOR PRIOR TO ROUGH-IN TO INSURE COMPLIANCE WITH THE MANUFACTURER'S REQUIREMENTS.
 - PROVIDE DOCUMENTATION OF DUCT DETECTOR TESTING PER NFPA 72, 2010 EDITION TABLE 10.4.2.2-14(G)(4) AIR DUCT DETECTORS SHALL BE TESTED/INSPECTED TO ENSURE THAT THE DEVICE WILL SAMPLE THE AIRSTREAM. THE TEST SHALL BE MADE IN ACCORDANCE WITH THE MANUFACTURER'S PUBLISHED INSTRUCTIONS.
- LOCATE MANUAL PULL STATIONS WITHIN 5'-0" OF THE EXIT DOOR PER NFPA AND IBC REQUIREMENTS. PROVIDE ANY SPECIAL ADAPTER PLATES OR COVER PLATES REQ'D TO MOUNT PULL STATIONS IN DOOR MULLIONS WHERE APPLICABLE.
- . EACH SPEAKER/STROBE LOCATED AT THE END OF A CORRIDOR MUST BE WITHIN 15'-0" OF THE END WALL PER NFPA 72, 2010 EDITION. HORN/STROBES IN CLASSROOMS AND OFFICES MUST BE LOCATED TO COMPLY WITH TABLE 7.5.4.3.1(a) & TABLE 7.5.4.3.1(b) OF NFPA 72. DO NOT ADJUST LOCATIONS OF HORN/STROBES WITHOUT CONSULTING WITH THE ENGINEER AND OBTAINING WRITTEN PERMISSION.
- 10. FIELD VERIFY LOCATION OF FIRE ALARM PANEL "FAC" AND/OR REMOTE FIRE ALARM ANNUNCIATOR "FAA" WITH OWNER AND AUTHORITY HAVING JURISDICTION PRIOR TO ROUGH-IN.
- 11. IN ADDITION TO SMOKE DETECTORS SHOWN, CONTRACTOR WILL BE REQUIRED TO FURNISH & INSTALL SMOKE DETECTORS IN ALL ROOMS WITH FIRE ALARM POWER SUPPLIES AND POWER BOOSTERS. IN ADDITION TO 120V CIRCUITS SHOWN, CONTRACTOR SHALL BE REQUIRED TO FURNISH & INSTALL ANY 120V CIRCUITS NECESSARY TO PROVIDE A COMPLETE AND OPERABLE FIRE ALARM SYSTEM.
- 12. ADDITIONAL FIRE ALARM DEVICES: THE ELECTRICAL CONTRACTOR AND FIRE ALARM SYSTEM INSTALLER SHALL FURNISH AND INSTALL ADDITIONAL FIRE ALARM DEVICES AT THE DISCRECTION OF THE ARCHITECT/ENGINEER AND/OR THE AUTHORITY HAVING JURISDICTION IN THE FOLLOWING QUANTITIES:
- (4) SPEAKER/STROBE LIGHTS
- (4) STROBE LIGHTS (6) DUCT MOUNTED SMOKE DETECTORS
- (2) MANUAL PULL STATIONS
- (4) CEILING MOUNTED SMOKE OR HEAT DETECTORS • (6) FIRE/SMOKE DAMPER CONNECTIONS WITH REMOTE INDICATORS.

INCLUDE COMPLETE COSTS TO FURNISH AND INSTALL THE ABOVE ADDITIONAL DEVICES IN BASE BID, INCLUDING ALL CONDUIT, OUTLET BOXES, 120V POWER, WIRING, AND SYSTEM PROGRAMMING. ANY DEVICES NOT USED SHALL

BE TURNED OVER TO THE OWNER AS SPARE DEVICES AT THE END OF THE PROJECT.

13. FACP PANEL AND DIGITAL VOICE COMMAND CENTER SHALL BE CAPABLE OF ADDING ASI MASS NOTIFICATION SYSTEM COMPONENTS TO THE PANEL. SUPPLY ALL NECESSARY COMMUNICATION CARDS AND SYSTEM COMPONENTS FOR ADDITION OF THIS SYSTEM BY THE UNIVERSITY UNDER THIS PROJECT. CONTRACTOR SHALL COORDINATE INSTALLATION WITH RADIO COMMUNICATION SERVICE - CONTACT: DAVID WHITE @ 803-773-9743 AND VINNY BOCCHINO @ 803-931-2951. THIS COORDINATION SHALL OCCUR PRIOR TO STARTING WORK

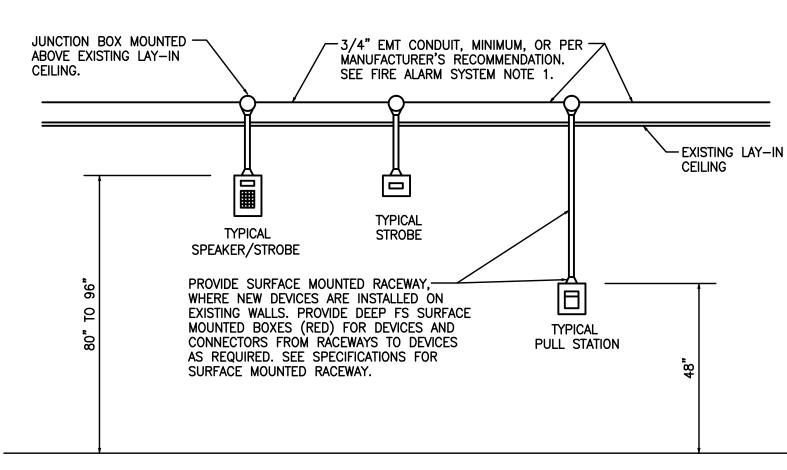
	FIRE ALARM STMBOLS
FACP	FIRE ALARM CONTROL PANEL OR REMOTE ANNUNCIATOR.
FAA	FIRE ALARM REMOTE ANNUNCIATOR.
E	FIRE ALARM MANUAL PULL STATION. 48" AFF.
30	FIRE ALARM SPEAKER AND FLASHING LIGHT, CANDELA RATING AS NOTED. MOUNT BETWEEN 80" AND 96" AFF PER NFPA 72 AND ADA REQ'TS.
75	SAME AS ABOVE, EXCEPT CEILING MOUNTED SPEAKER AND FLASHING LIGHT.
⑮	FIRE ALARM FLASHING LIGHT, CANDELA RATING AS NOTED. MOUNT BETWEEN 80" AND 96" AFF PER NFPA 72 AND ADA REQ'TS.
†	SAME AS ABOVE, EXCEPT CEILING MOUNTED FLASHING LIGHT.
S	SMOKE DETECTOR. CEILING MOUNTED, UNLESS NOTED.
⊕	HEAT DETECTOR. CEILING MOUNTED, UNLESS NOTED.
0	DUCT MOUNTED SMOKE DETECTOR, FURNISHED & INSTALLED UNDER DIVISION 28. SEE ELECTRICAL SPECIFICATIONS AND DETAIL ON DRAWINGS FOR WIRING.
(MM)	FIRE ALARM MONITORING MODULE.
ŒM 〉	FIRE ALARM CONTROL MODULE.
€SD)	FIRE / SMOKE DAMPER, FURNISHED & INSTALLED BY MECHANICAL CONTRACTOR, POWER WIRED BY ELECTRICAL CONTRACTOR. PROVIDE DUCT DETECTOR AS REQUIRED BY CODE AND AS SHOWN ON DRAWINGS. PROVIDE 120V CONNECTION AS REQUIRED.
	EXISTING WALL OR CEILING MOUNTED HORN/STROBE LIGHT TO BE REMOVED. SEE DEMOLITION PLANS.
	EXISTING WALL OR CEILING MOUNTED STROBE LIGHT TO BE REMOVED. SEE DEMOLITION PLANS.
E	EXISTING CEILING MOUNTED SMOKE OR HEAT DETECTOR TO BE REMOVED. SEE DEMOLITION PLAN.

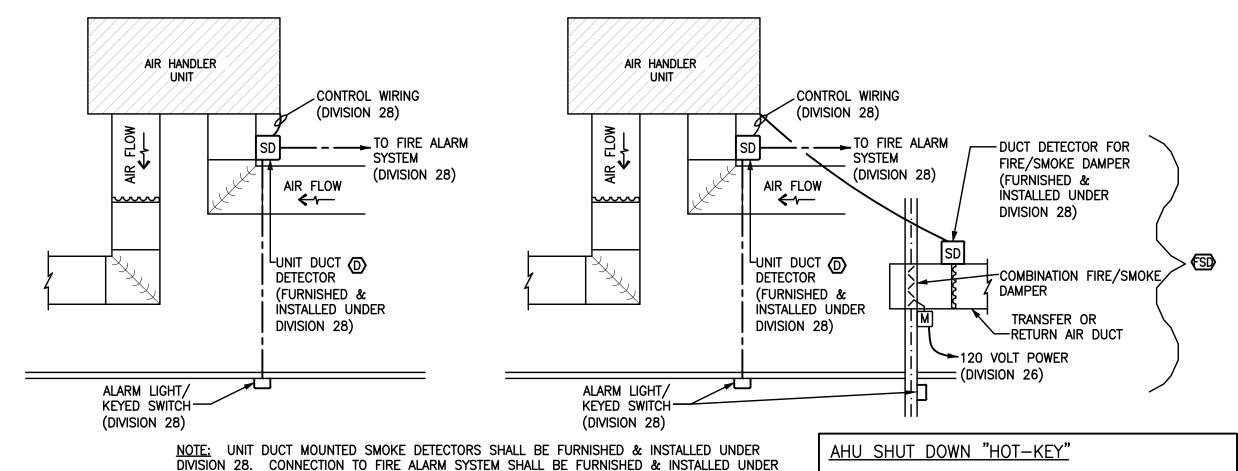
ELECTRICAL DEMOLITION NOTES

EXISTING DUCT MOUNTED SMOKE DETECTOR TO BE REPLACED. SEE DEMOLITION PLANS.

EXISTING MANUAL PULL STATION TO BE REMOVED/REPLACED. SEE DEMOLITION PLANS.

- FD1. THE EXISTING FIRE ALARM SYSTEM SHALL BE DEMOLISHED COMPLETELY AND A NEW SYSTEM INSTALLED. THE EXISTING FIRE ALARM SYSTEM MUST REMAIN COMPLETE AND OPERATIONAL DURING THE INSTALLATION OF THE NEW FIRE ALARM SYSTEM UNLESS SPECIFICALLY PHASED WITH THE OWNER AND OFFICE OF SCHOOL FACILITIES. ONCE NEW SYSTEM HAS BEEN INSTALLED, THE EXISTING SYSTEM CAN BE DEMOLISHED.
- FD2. IN ALL AREAS WHERE EXISTING FIRE ALARM DEVICES ARE BEING REMOVED, AND WHERE OTHER DEMOLITION WORK IS OCCURRING, REMOVE ALL EXISTING FIRE ALARM DEVICES AND OTHER RELATED EQUIPMENT NO LONGER IN USE, AND ALL WIRING AND CONDUIT NOT BEING REUSED. EXISTING CONDUIT RUN CONCEALED IN EXISTING WALLS NOT BEING REMOVED AND/OR REPLACED MAY BE ABANDONED. WHERE EXISTING DEVICES ARE SURFACE MOUNTED, THE EXISTING DEVICE, BOX, CONDUIT AND WIRE MUST BE REMOVED TO A POINT ABOVE THE FINISH CEILING AND THEN ABANDONED.





TYPICAL ELEVATIONS - NEW WALL MOUNTED DEVICES

PENTHOUSE LEVEL

4X4 J-BOX

MASS COMM.

CONTROL ATI PA

PANEL

COMM 730A

#6 INSULATED GROUND IN—

... 3/4" C. TO BUILDING STEEL.

CONNECT TO GROUNDING

LUG ON CABINET.

ROUTE 1" CONDUIT WITH PULL WIRE FROM ATI

PANEL TO STORAGE RM 801 ON THE ROOF.

WEATHER-HEAD AT ANTENNA LOCATION. ALL

BENDS IN CONDUIT TO BE SWEEPING TYPE.

PENETRATE EXTERIOR WALL WITH

SEAL PENETRATION WEATHER TIGHT.

ROOF LEVEL

MASS COMMUNICATION CONTROL-

PANEL. PROVIDED BY OTHERS,

20A/1P SPARE BREAKER

MARK BREAKER IN RED, LABEL AS

"MASS COMMUNICATION PANEL" AND

PROVIDE WITH MFR's LOCKING DEVICE

PROVIDE CONDUIT PATHWAY, 1" C. WITH MINIMUM

MASS COMMUNICATION ATI PANEL. CONDUIT AND

WIRING BY ELECTRICAL CONTRACTOR. FIELD VERIFY

NUMBER AND TYPE OF WIRING NEEDED PRIOR TO

CONNECT MASS COMMUNICATION COMM/SPEAKER

ALARM MANUFACTURE ON CONNECTION AND

WIRING TO FAC/VCC AS REQUIRED. VERIFY WITH FIRE

PROGRAMMING REQUIREMENTS. PROVIDE NECESSARY

COMPLETELY WITH ATI MASS COMMUNICATION PANEL. -

FIRST LEVEL

PER NFPA 72.

TO TELE. BOAR

DIGITAL COMMUNICATOR,

SEE SPECS.

20A/1P SPARE BREAKER

MARK BREAKER IN RED, LABEL AS

"FIRE ALARM CIRCUIT CONTROL", AND

PROVIDE WITH MFR's LOCKING DEVICE

IN PANEL ELECT. ROOM 119C.

OPTIONAL COMMUNICATION CARDS TO INTERFACE

#12AWG COMM/SPEAKER WIRE FROM FAC/VCC TO -

INSTALLED BY ELECTRICAL

SEVENTH LEVEL

PER NFPA 72.

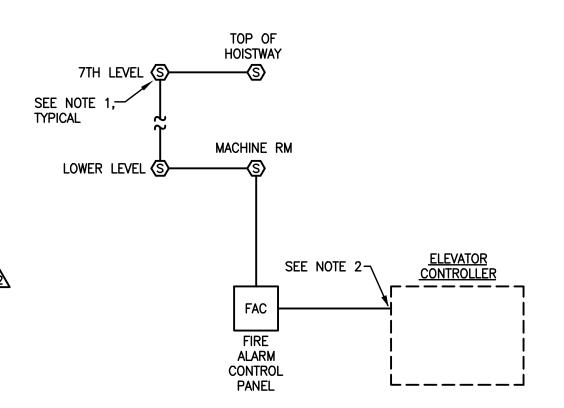
SIXTH LEVEL

FOURTH LEVEL

CONTRACTOR.

JUNCTION BOX -PAINT RED SUPPORT FROM STRUCTURAL SYSTEM - FLEXIBLE CONNECTION OUTLET BOX-DETECTOR -

SMOKE DETECTOR INSTALLATION DETAIL



ELEVATOR NOTES

- 1. LOCATE SMOKE DETECTORS IN LOBBIES AND MACHINE ROOM ON CEILING NEAR CENTER OF ROOM, 36" FROM ANY AIR VENT. INSTALL ON EACH FLOOR AS REQUIRED.
- 2. TIE IN FAC PANEL TO ELEVATOR CONTROLLER PER THE MFR'S RECOMMENDATIONS SO THAT ELEVATOR RECALL OCCURS UPON ACTIVATION OF THE LOBBY OR MACHINE ROOM DETECTORS. PROVIDE ALL RELAYS & CONTROL MODULES NECESSARY TO SEND THE ELEVATOR RECALL SIGNALS REQ'D BY ASME 17.1. COORDINATE WITH ELEVATOR SUPPLIER PRIOR TO STARTING WORK TO AVOID CONFLICTS.
- 3. REFER TO FIRE ALARM PLAN FOR ACTUAL WIRING OF DETECTORS.

ELEVATOR RETROFIT NOTES:

THE EXISTING ELEVATORS (TOTAL OF 3) SHALL BE RETROFITTED TO PROVIDE A FIREMAN SAFETY WARNING SYSTEM (FIRE HELMET/HAT) PER THE USC FIRE MARSHAL PER ANSI/ASME A17.1. THIS SYSTEM AND ASSOCIATED FA CIRCUITS WILL NEED TO BE PROVIDED IN EACH INDIVIDUAL HOISTWAY AND MACHINE ROOM.

OPERATION - FIREFIGHTER'S HELMET (HAT) SHALL:

BURN STEADY ON WHEN ELEVATOR IS PLACED IN BYPASS BY SERVICE KEY. FLASH IF THE SMOKE DETECTOR IS ACTIVATED IN THAT ELEVATORS PARTICULAR HOISTWAY OR ASSOCIATED MACHINE ROOM.

THE ELEVATOR EQUIPMENT MANUFACTURER AND THE ELECTRICAL CONTRACTOR SHALL COORDINATE THE SAFETY WARNING SYSTEM REQUIREMENTS OF THE ELEVATOR PRIOR TO STARTING WORK, AND SHALL REVISE THE WIRING DIAGRAM TO REFLECT THE ACTUAL EQUIPMENT BEING SUPPLIED, AT NO COST TO THE OWNER OR THE ENGINEER.

ELEVATOR RISER DIAGRAM (Non-Sprinkled Building)

HVAC AUTOMATIC FAN SHUTDOWN

MEZZANINE LEVEL INITIATING LOOP(S)

ROOF LEVEL INITIATING LOOP(S)

7th LEVEL INITIATING LOOP(S)

7th LEVEL ALARM LOOP(S)

6th LEVEL INITIATING LOOP(S)

6th LEVEL ALARM LOOP(S)

5th LEVEL INITIATING LOOP(S)

4th LEVEL INITIATING LOOP(S)

4th LEVEL ALARM LOOP(S)

3rd LEVEL INITIATING LOOP(S)

3rd LEVEL ALARM LOOP(S)

2nd LEVEL INITIATING LOOP(S)

2nd LEVEL ALARM LOOP(S)

REMOTE ANNUNCIATOR

FAA MIC

REMOTE VOICE CNTL

PROVIDE SURGE PROTECTION ON BOTH

—POWER AND OUTSIDE COMMUNICATION

INITIATING LOOP(S)

ALARM LOOP(S)

ALARM

VOICE COMMAND

MECH 125

CONTROL

MECH 125

SURGE

5th LEVEL ALARM LOOP(S)

ROOF LEVEL ALARM LOOP(S)

DIVISION 28. ALARM LIGHT & WIRING SHALL BE FURNISHED & INSTALLED UNDER DIVISION 28.

HVAC CONTROL AND INTERLOCK WIRING SHALL BE FURNISHED & INSTALLED UNDER DIVISION 28.

ALARM LIGHT/KEYED SWITCH, LOCATE AS DIRECTED IN FIELD. SEE FIRE ALARM NOTES FOR LOCATION AND TESTING OF DUCT MOUNTED SMOKE DETECTORS. "NORMAL" OR "OFF NORMAL".

ELECTRICAL CONTRACTOR SHALL FURNISH & INSTALL ALL CONDUIT AND BOXES NECESSARY FOR

THE FIRE ALARM MANUFACTURER IS TO PROVIDE A "HOT-KEY"

TO OPERATED THE SHUT DOWN OF ALL AHU UNITS. A SUPERVISED PROGRAMMABLE "HOT KEY" FOR ALL AHU SHUTDOWN DEFEAT MODULES MUST BE PROVIDED AT THE FACP AND THE REMOTE ANNUNCIATOR AS DICTATED BY THE LOCAL USC FIRE MARSHAL. THIS SWITCH MUST INDICATE



Architects

West Columbia

South Carolina

412 Meeting Street

H CARO

SIMS GROUP ZENGINEERS, INC.

No. C03104

CAROLINA FOR 9 RE NEW F

BID DOCUMENTS

REVISIONS: OSE COMMENTS ADDED 4/5/12 REV 2 - ADDENDUM NO. 1 ADDED MASS COMMUNICATION

DRAWN BY:

CHECKED BY:

COMM NO:

08/24/2011

SHEET TITLE:

FIRE ALARM SYMBOLS, DETAILS, RISER AND NOTES

LINES. SEE SPECIFICATIONS (TYPICAL). PARTIAL FIRE ALARM RISER DIAGRAM SIMS GROUP ENGINEERS, INC. 800 Columbiana Drive, Suite 208 Irmo, South Carolina 29063 Phone: (803) 765-1007 Fax: (803) 765-1030

STANDPIPE FIRE PUMP SYSTEM MONITORING NOTE: FURNISH & INSTALL MONITORING MODULES AS NEEDED

ALARM AND SUPERVISORY SIGNALS SHALL BE SENT TO

THE FIRE ALARM SYSTEM TO INDICATE A PUMP RUNNING

CONDITION (ALARM), LOSS OF LINE POWER (SUPERVISORY)

AND FAILURE TO START ON CONTROLLERS (SUPERVISORY)

NO CHANGEORDER WILL BE ISSUED FOR ADDITIONAL WORK NOT INDICATED ON THE DRAWINGS BUT REQ'D TO PROPERLY MONITOR THE SPRINKLER SYSTEM.

FLOW TAMPER

AHU-XX 団O AHU-XX

BID SET

(EOL)

 $^{\prime}$ see fire pump system -MONITORING NOTE THIS SHEET.

www.simsgroupusa.com

SEE FIRE ALARM SYSTEM NOTES -

AND HVAC AUTOMATIC FAN

SHUTDOWN DETAIL, TYPICAL.

FM00346277

USC Work Order

Description HAZMAT SURVEY-001

Site **COLUMBIA**

Building 001

Floor **Equipment**

Parent WO #

CP Number

Requestor

JAMES F. BYRNES BUILDING

Room:

Start Date Due date

Crew

Assigned To

JPROVENCE HAZMAT

Request Date

Project Manager

28-OCT-10

28-SEP-10

KALLEY

Priority

5

FM00346277 Request #

Description

H27-I851

HAZMAT SURVEY-001

CP00306099

BYRNES FIRE PROTECTION UPGRADES

State/Internal Project Number

FISHER, PETE

7-9346

Telephone Alternate

Non-Available Time

Telephone

Telephone

777-9346 **Estimated Cost** \$ 0.00

Billing FIXED PRICE

53100-W384-57120 (COLUMBIA CAMPUS FIRE ALARM

UPGRADES)

FISHER, PETER L.

Task List

(CHECK ALL THAT APPLY AND PROVIDE ADDITIONAL INFORMATION AS NEEDED)

HAZMAT SURVEY(S) REQUESTED FOR THE FOLLOWING

- FLOOR TILE
- JOINT COMPOUND
- WALLS
- **MASTIC**
- **CEILING TILE**
- PIPE INSULATION
- VINYL SHEET FLOORING
- **FIREPROOFING**
- FUME HOODS/TABLE TOPS
- **ROOFING MATERIALS**
- FIRE DOORS
- GASKETS/VALVES
- **BOILER INSULATION**
- ACOUSTICAL POPCORN CEILING
 - **DUCT WORK**
 - OTHER (PLEASE DESCRIBE BELOW)

DATE WORK	(STARTED	CAUSE	
DATE WORK	COMPLETED	CONDITIO	DN
EQUIPMENT	•	,	
CLOSING RI	EMARKS		
BENCHSTO	CK MATERIALS		
Qty	Description		Price Per Unit

Supervisor	's Approval
------------	-------------

Note Date Title FM00346277

USC Work Order

04-AUG-11 HAZMAT SURVEY RESULTS

SURVEY DATE: 7-29-2011

INSPECTOR #: DARRYL WASHINGTON II BI-00568

STATUS: THE FOLLOWING MATERIALS HAVE BEEN TESTED FOR ASBESTOS CONTAINING MATERIALS

PLASTER- NEGATIVE FOR ASBESTOS CONTAINING MATERIALS

JOINT COMPOUND- NEGATIVE FOR ASBESTOS CONTAINING MATERIALS

SHEET ROCK- NEGATIVE FOR ASBESTOS CONTAINING MATERIALS

TEXTURED CEILING MATERIAL - (CEILING OF MECHANICAL ROOM) - POSITIVE FOR ASBESTOS CONTAINING MATERIALS

9X9 GREY FLOORING- POSITIVE FOR ASBESTOS CONTAINING MATERIALS

BLACK MASITC (FLOORING OR ON FIBERGLASS LINES) - POSITIVE FOR ASBESTOS CONTAINING MATERIALS

WHITE PAINT- NEGATIVE FOR LEAD BASE PAINT

BLUE PAINT- NEGATIVE FOR LEAD BASE PAINT

INSPECTORS NOTES

- 1. MOST WALL MATERIALS WILL BE EITHER PLASTER OR METAL PRE FAB MATERIALS
- 2. ALL FLOORING MUST BE DEEMED POSITIVE UNTIL FURTHER TESTING
- 3. NO DRILLING OR DISTURBANCE OF ANY CEILING MATERIAL IN LOWER MECHANICAL ROOM
- 4. WHITE 2X2 FIBERGLASS CEILING TILES IN PLACE NOT SUSPECT FOR ASBESTOS CONTAINING MATERIALS
- 5. ANY MATERIALS NOT LISTED THAT YOU MAY COME INTO CONTACT WITH DURING JOB PLEASE CALL THE ASBESTOS PROGRAM MANGER FOR FURTHER TESTING OR ASBESTOS OR LEAD ABATEMENT

REFER TO THE SURVEY RESULTS DOCUMENT ATTACHED TO THE WO FOR DETAILED INFORMATION.

02-APR-04 ASBESTOS MAY BE PRESENT IN THIS BUILDING

WARNING - ASBESTOS EXPOSURE ALERT - EXPOSURE TO ASBESTOS MAY BE HARMFUL TO YOUR HEALTH

AS OF 4/2/2004 THE FOLLOWING AREAS WITHIN THE BUILDING HAVE BEEN IDENTIFIED BY SURVEY TO CONTAIN ASBESTOS:

BLDG. NO. 001 .J. BYRNES CENTER

BASEMENT MECHANICAL ROOM--> SPRAY ON 3 COATS PLASTER --> CEILING [800 SQ FT]

ENTRANCE FOYER ASBESTOS --> HAS BEEN REMOVED

BASEMENT MECHANICAL ROOM --> SUPPLY DUCT PLENUM ON AIR HANDING UNIT [225 SQUARE FEET.]

SOUTH WEST CORNER --> ABANDONED DUCT [10 SQ FT]

SOUTH WEST CORNER --> BOILER PIPE [8 LIN FT]

THE FOLLOWING COMMON TYPES OF BUILDING COMPONENTS COULD CONTAIN MATERIALS THAT, WHEN DISTURBED, MIGHT EXPOSE YOU TO ASBESTOS:

- 1. FLOOR TILE
- 2. PIPE INSULATION
- 3. BLACK MASTIC
- 4. HVAC DUCT MASTIC
- 5. SPRAYED-ON FIREPROOFING
- 6. SPRAYED-ON CEILINGS
- 7. SHEETROCK JOINT COMPOUND

BEFORE DISTURBING THESE TYPES OF COMPONENTS, CONFIRM THAT THEY DO NOT CONTAIN ASBESTOS AND TAKE PROPER PRECAUTIONS AT ALL TIMES.

04-AUG-10 2009-09-15 BLDG COMPONENT ASBESTOS/LEAD EXPOSURE UPDATE

BELOW ARE THE ASBESTOS AND LEAD TESTING RESULTS FOR THE J F BYRNES BUILDING:

SHEET ROCK: NEGATIVE FOR ASBESTOS CONTAINING MATERIALS

JOINT COMPOUND: NEGATIVE FOR ASBESTOS CONTAINING MATERIALS

PLASTER WALL MATERIAL: NEGATIVE FOR ASBESTOS CONTAINING MATERIALS

WHITE WALL PAINT: NEGATIVE FOR LEAD BASE PAINT

BLUE PAINT: NEGATIVE FOR LEAD BASE PAINT

2X2 WHITE CEILING TILES: NEGATIVE FOR ASBESTOS CONTAINING MATERIALS

HVAC DUCT RETURNS: POSITIVE FOR BLACK MASTIC

FIBERGLASS LINES ABOVE THE CEILING: POSITIVE FOR BLACK MASTIC

FLOOR TILE: POSITIVE FOR BLACK MASTIC

FM00346277 USC Work Order

JOINTS AND ENDS: POSITIVE FOR ASBESTOS CONTAINING MATERIALS

IF YOU AND/ OR CONTRACTORS NEED TO DISTURB ANY MATERIALS YOU DEEM SUSPECT THAT ARE NOT LISTED ABOVE, STOP WORK AND CONTACT THE ASBESTOS PROGRAM MANAGER, 777-1208. IF YOU NEED TO DISTURB ANY MATERIAL LISTED AS POSITIVE, YOU MUST CONTACT THE ASBESTOS PROGRAM MANAGER TO ARRANGE FOR REMOVAL. THIS INFORMATION MUST BE PASSED ALONG TO ALL CONTRACTORS, SUB-CONTRACTORS, AND INDIVIDUALS WORKING IN THIS BUILDING



706 Gralin Street, Kernersville, NC 27284

Phone: (336) 992-1025 Fax: (336) 992-4175 Email: greensborolab@emsl.com

Attn: Ed Pitts

Fax:

University of South Carolina

743 Greene Street Columbia, SC 29208

(803) 777-7334 Phone: (803) 777-3296

Project: 1 JF Byrnes Bld

Customer ID: Customer PO: UNSC62

Received:

09/03/09 10:00 AM

EMSL Order: 02090

020905187

EMSL Proj:

Analysis Date: 9/8/2009

Asbestos Analysis of Bulk Materials via EPA 600/R-93/116 Method using Polarized Light Microscopy

		Non-Asbestos			<u>Asbestos</u>	
Sample	Description	Appearance	%	Fibrous	% Non-Fibrous	% Type
1 020905187-0001	Plaster	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
2 020905187-0002	Ceiling Tile	Tan Fibrous Heterogeneous		Cellulose Min. Wool	20% Non-fibrous (other)	None Detected
3 020905187-0003	Joint Compound	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
4 020905187-0004	Sheetrock	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
5 020905187-0005	Ceiling Tile	Tan/White Fibrous Heterogeneous	30% 40%	Cellulose Min. Wool	30% Non-fibrous (other)	None Detected
6 020905187-0006	Plaster	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
7 020905187-0007	Joint Compound	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected

Analyst(s)	Steple Bound
Kristie Hein (18)	Stephen Bennett, Laboratory Manager or other approved signatory

Due to magnification limitations inherent in PLM, asbestos fibers in dimensions below the resolution capability of PLM may not be detected. The limit of detection as stated in the method is 1%. The above test report relates only to the items tested and may not be reproduced in any form without the express written approval of EMSL Analytical, Inc. EMSL's liability is limited to the cost of analysis. EMSL bears no responsibility for sample collection activities or analytical method limitations. Interpretation and use of test results are the responsibility of the client. Samples received in good condition unless otherwise noted. This report must not be used to claim product endorsement by NVLAP or any agency of the U.S. Government.

Samples analyzed by EMSL Analytical, Inc. Kernersville 706 Gralin Street, Kernersville NC NVLAP Lab Code 102104-0, CA ELAP 2689, Virginia 3333-000228, West Virginia LT000321



706 Gralin Street, Kernersville, NC 27284

Phone: (336) 992-1025 Fax: (336) 992-4175 Email: greensborolab@emsl.com

Attn: Ed Pitts

Fax:

University of South Carolina

743 Greene Street

Columbia, SC 29208

(803) 777-7334

Phone: (803) 777-3296

Project: 1 JF Byrnes Bld

Customer ID:

UNSC62

Customer PO: Received: EMSL Order:

09/03/09 10:00 AM

020905187

EMSL Proj:

Analysis Date: 9/8/2009

Asbestos Analysis of Bulk Materials via EPA 600/R-93/116 Method using Polarized **Light Microscopy**

				Non-Asb	estos	<u>Asbestos</u>	
Sample	Description	Appearance	%	Fibrous	% Non-Fibrous	% Type	
8 020905187-0008	Sheetrock	Gray Fibrous Heterogeneous		Cellulose Glass	100% Non-fibrous (other)	None Detected	
9 020905187-0009	Plaster	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected	
10 020905187-0010	Joint Compound	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected	
11 020905187-0011	Sheetrock	Gray Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected	
12 020905187-0012	Plaster	Gray/Tan Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected	
13 020905187-0013	Joint Compound	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected	
14 020905187-0014	Sheetrock	Beige Fibrous Heterogeneous	3%	Cellulose	97% Non-fibrous (other)	None Detected	

Analyst(s)	Style Bound
Kristie Hein (18)	Stephen Bennett, Laboratory Manager
	or other approved signatory

Due to magnification limitations inherent in PLM, asbestos fibers in dimensions below the resolution capability of PLM may not be detected. The limit of detection as stated in the method is 1%. The above test report relates only to the items tested and may not be reproduced in any form without the express written approval of EMSL Analytical, Inc. EMSL's liability is limited to the cost of analysis. EMSL bears no responsibility for sample collection activities or analytical method limitations. Interpretation and use of test results are the responsibility of the client. Samples received in good condition unless otherwise noted. This report must not be used to claim product endorsement by NVLAP or any agency of the

Samples analyzed by EMSL Analytical, Inc. Kernersville 706 Gralin Street, Kernersville NC NVLAP Lab Code 102104-0, CA ELAP 2689, Virginia 3333-000228, West Virginia LT000321



706 Gralin Street, Kernersville, NC 27284

Phone: (336) 992-1025 Fax: (336) 992-4175 Email: greensborolab@emsl.com

Attn: Ed Pitts

Fax:

University of South Carolina

743 Greene Street Columbia, SC 29208

> (803) 777-7334 Phone: (803) 777-3296

Project: 1 JF Byrnes Bld

Customer ID:

Customer PO:

Received: EMSL Order: 09/03/09 10:00 AM

020905187

UNSC62

EMSL Proj:

Analysis Date: 9/8/2009

Asbestos Analysis of Bulk Materials via EPA 600/R-93/116 Method using Polarized **Light Microscopy**

			<u>Asbestos</u>			
Sample	Description	Appearance	%	Fibrous	% Non-Fibrous	% Type
15 020905187-0015	Plaster	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
16 020905187-0016	Plaster	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
17 020905187-0017	Plaster	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
18 020905187-0018	Joint Compound	White Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
19 020905187-0019	Sheetrock					Not Submitted

Analyst(s)	Tople Bound
Kristie Hein (18)	Stephen Bennett, Laboratory Manager or other approved signatory

Due to magnification limitations inherent in PLM, asbestos fibers in dimensions below the resolution capability of PLM may not be detected. The limit of detection as stated in the method is 1%. The above test report relates only to the items tested and may not be reproduced in any form without the express written approval of EMSL Analytical, Inc. EMSL's liability is limited to the cost of analysis. EMSL bears no responsibility for sample collection activities or analytical method limitations. Interpretation and use of test results are the responsibility of the client. Samples received in good condition unless otherwise noted. This report must not be used to claim product endorsement by NVLAP or any agency of the

Samples analyzed by EMSL Analytical, Inc. Kernersville 706 Gralin Street, Kernersville NC NVLAP Lab Code 102104-0, CA ELAP 2689, Virginia 3333-000228, West Virginia LT000321



107 Haddon Avenue, Westmont, New Jersey 08108 1-800-220-3675

EMSL ANALYTICAL, Inc.	CHAIN OF	CUSTODY		yar www.compression
Your Name: Company: Street:	Pu	EMSL-Bill to:	Third Party Billing requ authorization from third	ires written party
Box #: City/State:	Zip	Street: Box #: City/State:		Zip
Phone Results to: Name: Telephone #: Project Name/Number: Project Name/Number:	•	Fax Results to: Name: Fax #: Purchase Order #:		
□ 3 Hours □ 6 Hours □ 12 Hours □ 24 F	SAMPLE	72 Hours	□ 5 Days	□ 6-10 Days
ASBESTOS ANALYSIS	LEAD ANAL		/astewater	L ANALYSIS
PCM - Air NIOSH 7400 (A) Issue 2: August 1994 OSHA w/TWA TEM AIR AHERA 40 CFR, Part 763 Subpart E NIOSH 7402 Issue 2 EPA Level II PLM - Bulk EPA 600/R-93/116 NY Stratified Point Count California Air Resource Board (CARB) 435 NIOSH 9002 PLM NOB (Graviroctric) NYS 198.1 EPA Point Count (400 Points) Standard Addition Point Count SOILS EPA Protocol Qualitative	Soil, SW846-7420 Air, NIOSH 7082 Chips, SW846-74 Wastewater, SW8 TCLP LEAD SW8 Graphite Furnac Air, NIOSH 710S Wastewater, SW8- Soil, SW846-7421 Drinking Water, E ICP - Inductively	20 or AOAC 5.009 (974.02) 46-7420 46-7421 46-7	Air Samples Mold & Fungi Mold & Fungi Bacterial Count Bacterial Count Water Sample Total Coliform Escherichia Co Legionella Salmonella Giardia and Cr Wipe and Bull Mold & Fungi Mold & Fungi Mold & Fungi Mold & Fungi Mold & Fungi	by Air O Cell by Agat Plate count & id and Gram Stain and Identification S. Fecal Coliforms bli, Fecal Streptococcus yptosporidium (Samples - Direct Examination - (Culture follow up to mination if necessary) - Culture (Count & ID) - Culture (Count only)
☐ EPA Protocol Quantitative ☐ EMSL MSD 9000 Method fibers/gram ☐ Superfund EPA 540-R097-028 (dust generation) TEM BULK ☐ Drop Mount (Qualitative) ☐ Chatfield SOP-1988-02 ☐ TEM NOB (Gravimetric) NY 198.4 TEM MICROVAC ☐ ASTM D 5755-95 (Quantitative) TEM WIPE ☐ ASTM D-6480-99 ☐ Qualitative☐ ☐ EPA 100.1 ☐ EPA 100.2 ☐ NYS 198.2	MATERIALS Full Particle Identic Optical Particle Identic Dust Mites and Interpretation Particle Size & Dital Product Comparis Pailure Analysis Corrosion Analysis Corrosion Analysis Glove Box Contain Petrographic Exam Portland Cement in (OSHA ID-143) Man Made Vitnous Synthetic Fiber Ide Other:	ification entification sect Fragments stribution on tun s sement Study mination of Concrete n Workplace Atmospheres s Fibers – MMVF's	Bacterial Count & Identification (3 most prominent types) Other: IAQ ANALYSIS Nuisance Dust (NIOSI 0500 & 0600) Airborne Dust (PM10, TSP) Silica Analysis by XRD Niosh 7500 HVAC Efficiency Carbon Black Airborne Oil Mist Other:	
Client Sample # (S)			TOTAL SAMPLE#	19
Relinquished: Received: Received: Received:		Date: Date: Date: Date: Date:	Time: Time: Time: Time: Page 1	10:00

Building	001 J F B	Building #	Sample Analysis Type of Analysis: Lead / Asbestos Date:	Tum/	Turn Around Time	3 DAYS	
Area	Sample ID	Sampled	Material Location	F/NF	Cond	Quantity	Pot to Disturb
4	-	PLASTER	HALL @ STAIRWAY 01	Щ	G005	140 SQ FT	LOW
∢	2	2X2 WHITE CEILING TILE	HALL @ STAIRWAY 01	ш	G005	140 SQ FT	ГОМ
4	3	JOINT COMPOUND	RM 608	ш	G00D	20 SQ FT	LOW
∢	4	SHEET ROCK	RM 608	ш	G00D	220 SQ FT	LOW
∢	5	2X2 WHITE CEILING TILE	HALL @ 608	ш	G005	800 SQ FT	TOW
A	9	PLASTER	WALL AT MENS REST ROOM	ш	G005	150 SQ FT	NON
4	7	JOINT COMPOUND	RM 501	ш	G005	35 SQ FT	LOW
4	8	SHEET ROCK	RM 501	ш	G005	320 SQ FT	NON
∢	6	PLASTER	RM 522	ш	G00D	130 SQ FT	ПОМ
∢ ′	10	JOINT COMPOUND	WALL AT 429	ட	G005	20 SQ FT	ПОМ
License #	# 00568	FM# FM00314345	Signature Signature	Requestor	JEFF T	JEFF TAYLOR	

Send lab results in PDF format as soon as possible to: License #

Darryl Washington 803-777-2399 720 College St. Columbia, SC 29208 WashinDH@fmc.sc.edu Ed Pitts 803-777-3296

Ty Russell 803-777-1208

NTRusse@fmc.sc.edu 720 College St. Columbia, SC 29208

720 College St. Columbia, SC 29208 EHP@fmc.sc.edu Fax # 803-777-3990 Print Form

Reset Form

L819

Turn Around Time

10-10-

p

Building # B

Sample Analysis
Type of Analysis: Lead / Asbestos Date:

)				
Area	Sample ID	Sample Material Sampled ID	Material Location	F/NF	Cond	F/NF Cond Quantity Pot to	Pot to Disturb
· 4	7	SHEET ROCK	HALL @ 429	Ŧ	G005	GOOD 120 SQ FT	LOW
∢	12	PLASTER	WALL AT 429	F	g005	GOOD 40 SQ FT	LOW
4	13	JOINT COMPOUND	RM 305	Ь	G005	25 SQ FT	LOW
∢	14	SHEET ROCK	RM 305	Н	g005	GOOD 200 SQ FT	LOW
∢	15	PLASTER	RM 308	Н	G005	GOOD 175 SQ FT	LOW

FM# License #

Darryl Washington 803-777-2399 720 College St. Columbia, SC 29208 WashinDH@fmc.sc.edu Send lab results in PDF format as soon as possible to:

Ed Pitts 803-777-3296 720 College St. Columbia, SC 29208

Signature

Ty Russell 803-777-1208 720 College St. Columbia, SC 29208 NTRusse@fine.sc.edu

Requestor

LLOW

60 SQ FT

G005

ட

LOW

800 SQ FT

GOOD

ш

LOW

500 SQ FT

G009

ш

HALL AT 120

RM 119

JOINT COMPOUND

18

4

SHEET ROCK

19

4

RM 119

RM 205

PLASTER

16

V

PLASTER

17

4

LOW

300 SQ FT

G005

ш

EHP@fmc.sc.edu Fax # 803-777-3990



706 Gralin Street, Kernersville, NC 27284

Phone: (336) 992-1025 Fax: (336) 992-4175 Email: greensborolab@emsl.com

Attn: Darryl Washington
University of South Carolina
743 Greene Street
Columbia, SC 29208

Customer ID: Customer PO:

UNSC62

Received:

08/03/11 10:10 AM

EMSL Order:

021104656

Fax:

(803) 777-7334

Project: 001 Byrnes Blvd

Phone: (803) 777-7000

EMSL Proj:

Analysis Date: 8/3/2011

Test Report: Asbestos Analysis of Bulk Materials via EPA 600/R-93/116 Method using Polarized Light Microscopy

			Non-Asl	<u>pestos</u>	<u>Asbestos</u>		
Description	Appearance	%	Fibrous	% Non-Fibrous	% Type		
Textured Ceiling Material	Beige Fibrous Heterogeneous			97% Non-fibrous (other)	3% Chrysotile		
Textured Ceiling Material					Stop Positive (Not Analyzed)		
Textured Ceiling Material					Stop Positive (Not Analyzed)		
Textured Ceiling Material					Stop Positive (Not Analyzed)		
Textured Ceiling Material					Stop Positive (Not Analyzed)		
	Textured Ceiling Material Textured Ceiling Material Textured Ceiling Material Textured Ceiling Material Textured Ceiling Material	Textured Ceiling Material Textured Ceiling Heterogeneous Textured Ceiling Material Textured Ceiling Material Textured Ceiling Material Textured Ceiling Material	Textured Ceiling Material Textured Ceiling Material	Description Appearance % Fibrous Textured Ceiling Material Beige Fibrous Heterogeneous Textured Ceiling Material Textured Ceiling Material Textured Ceiling Material Textured Ceiling Material	Textured Ceiling Material Fibrous Heterogeneous Textured Ceiling Material Textured Ceiling Material		

nitial report from 08/03/2011 11:59:15	
Analyst(s)	Tople Bound
Kristie Elliott (1)	Stephen Bennett, Laboratory Manager

EMSL maintains liability limited to cost of analysis. This report relates only to the samples reported and may not be reproduced, except in full, without written approval by EMSL. EMSL bears no responsibility for sample collection activities or analytical method limitations. Interpretation and use of test results are the responsibility of the client. This report must not be used by the client to claim product certification, approval, or endorsement by NVLAP, NIST or any agency of the federal government. Non-friable organically bound materials present a problem matrix and therefore EMSL recommends gravimetric reduction prior to analysis. Samples received in good condition unless otherwise noted. Estimated accuracy, precision and uncertainty data available upon request.

Samples analyzed by EMSL Analytical, Inc. Kernersville, NC NVLAP Lab Code 102104-0, CA ELAP 2689, Virginia 3333-000228, West Virginia LT000321

4656

::[M:5:

#142 J.



Chain of Custody EMSL Order Number (Lab Use Only):

								AND A FARMA
EMSL ANALYTICAL, INC.								THOME THE
Company: Un of	C -c -1				EMSL-B	ili to:	Sam	Eas to Co
Street: 74 2 22		<u>Count</u> SHT	. J.s.		Bill to is Dif	ferent	note instru	ctions in Comments**
City: Cala:		Province:	d- g					uthorization from 1250
Report To (Name):				Zip/Postal Code	s: 2,	12	08	Country:
	10010	11 12 Com	40	eral months Fo	~	7	7.	
	ncs	D. C.	217	Email/Address:	Chi		ul.	***************************************
Please Provide Results: Fax	☑ Email	Purch	nase C	order.	I.S. State	Com	mlas Tul	
The state of the s	32. T. M. AT ST. & CO. T IS THE OWNER.	LA SUL MAN PLANSMAN AND AND AND AND AND AND AND AND AND A	~~~~~	T) Options* - P	lesee C	track	ipies rai	(en:
3 Hour 6 Hour	24 Hour	48	Hour	72 Haus		10.11-	77	1 Micrale
'For RUSH TAT's Pleas Materials Science and	e Call Ahea	d to Confirm	Lab Ho	urs and Availability.	Not all T	AT	4/	alid or every test
Materials Science and	Communication of the Communica	are in busine		bestos	(I.e. 24 He	our = E	End of Nex	a Sucress Day
PCM - Air	PLW.	Bulk	Pis	bestos	An waterwater and the		T.F. C.	sel -edicinal international management
NIOSH 7400	PLI	M EPA 600/	R-93/1	16 %			M - Bulk TEM EP	
□ w/ 8hr. TWA	PLI	M EPA NOB	(<1%)				25 195.4 (non-mante
TEM- AIr 4-4.5hr TAT (AHERA ONLY		S 198.1 (fria	ble-N'	Y)			Chatfield	
AHERA 40 CFR, Part 763	NY	S 198.6 (no	n-friab	le-NY)		So	II/Rock/\	/em iculito
☐ EPA Level II	Point (Count w/ Gra	10 (<0.	25%) 🗌 1000 (<0	0.1%)		PLM CAL	RB 435 – A (0.25° //
☐ ISO 10312		☐ 40	00 (<0.	25%) 🔲 1000 (<0	0.1%)	11	TEM CAL	RB 405 = B (0,1% % RB 435 = B (0,1% %
TEM - Water	TEM -	Dust			10 10 基础			1 Screening Protocos
Fibers ≥10μm		rovac - AST		755			ner:	
The state of the s	THE CHARLES THE PARTY OF	e-ASTM D6	480		-	+		-
Flame Atomic Absorption	Lead	(FD)	-		TOPPES CHILD		SELECTION STATES OF STATES	aterials Science
Chips SW846-7000B or AOAC 97	4.02	☐ Air NIC	NCH 72	ICP 300 Modified			Common	Pariicle ID (large p.
☐ Soil SW846-7000B/7420	7.02			pe SW846-6010E	2 ~ " C	H	Full Parti	cle ID (environmenta
Air NIOSH 7082		MASTM.	Wine !	SW846-6010B or	C	H	Basic Ma	derial ID (solids) d Material ID
Wastewater SM3111B or SW846-70	00B/7420	Soil SV	V846-	6010 B or C	0			esting (Tensile Compr
☐ ASTM Wipe SW846-7000B/7420 ☐ ☐ Dnon ASTM Wipe SW846-7000B/74				SW846-6010B o				
TCLP SW846-1311/7420/SM 311	20 1B				10	1		on-by-products (social)
Graphite Furnace Atomic	Absorptio	1	Othe	6-6010B or C			X-Ray Fir	Dotescence (elem ->
Soil SW846-7421 Wastewa	ater EPA 2	00.9	Ottile	<u>"</u> ; U		H	MANE'S	iffraction (Crystathric (Fibrous glass, RC
	Water EP	THE PROPERTY OF THE PARTY OF TH				H	Particle 5	(morous glass, BC šize (sieve/microsco)
SA/I	Microbia		22.00.00 to 1.0000.000	The state of the s	evenumvalerie.		Combust	
Wipe and Bulk Samples	Air	Samples			***************************************			obic Examination
Mold & Fungi – Direct Examination		Mold & Fung	ji (Spo	re Trap)		Oth	ner:	and Cadimination
Mold & Fungi Culture (Genus Only	170	Mold & Fung	ji Cultı	re (Genus Only)			Marie Statement Cont. 9.1	IAQ
Mold & Fungi Culture (Genus & Specie	es)	viold & Fung	i (Ger	us & Species)		Nui	sance Di	ısı NIOSH [] 050n [
Bacterial Count & ID (Up to Three Types Bacterial Count & ID (Up to Five Types		Bacterial Culti	re & 10	(Up to Three Type	s)	Airt	orne Du	SL PM10 TE
U MRSA		ndotoxin Te	re & IC	(Up to Five Types)		Silic	ca Analys	ss: [] All Species
Pseudomonas aeruginosa	Rea	Time Q-P	CR (Se	e Analytical Guide t	or Codes	Silic	ca Analys	ils - Single Species
Water Samples	Cod	e:		o many modification of	or Code)		_I Alpha ⊜ ∃VAC Eff	trant: Cristobaliu ;
☐ Total Coliform & E.coli (P/A)		ionella					Darbon Bi	
Fecal Coliform (SM 9222D) Sewage Screen		evel 1 DLe	/el 2 [Level 3 Level	4		Airborne (
Heterotrophic Plate Court (2)	6 10th	er:				Bad	on Tactic	ormisi gg: Call for Kit and ∵
Heterotrophic Plate Count (SM 921 **Comments/Special instruction	(5)	CARL HALLES MALE WANTED	-			Oth	er:	ус учен тог тук айст.
A-1-2-2-2-2-2-2-2-2-2-2-2-2-2-2-2-2-2-2-	5 :					and solitable	Maria Maria Maria	ESSETS), as a visual system description and section in a
Client Sample #'s	ward and an action to the least	Caracteristic Brownian Commenter						17010.27
Relinquished (Client):		Date:					Samples	s: 5
Received (Lab):		Date:	8	2 11	Time:			
Analysis Completed in Accordance with	th EMEL's	Toppes '	2	3-11	Time:		0:	10
Analysis Completed in Accordance with Controlled Document-One Chain-R2-1/12/2010	amol 8	rerms and	Condi	ions located in th	e Analyti	cal Pr	ice Guide	

Print Form

959h

001 BYRNES BUILDING Building #____

Type of Analysis: Lead / Asbestos Date:

48 HRS Turn Around Time

Area	Sample ID	Material Sampled	Material Location	F/NF	Cond	Quantity	Pot to Disturb
A	-	TEXTURED CEILING MATERIAL	CEILING MATERIAL OF MECHANICAL ROOM BASEMENT	ш	Ø	1000 SQ FT	LOW
٨	2	TEXTURED CEILING MATERIAL	CEILING MATERIAL OF MECHANICAL ROOM BASEMENT	ш	Ø	1000 SQ FT	LOW
4	က	TEXTURED CEILING MATERIAL	CEILING MATERIAL OF MECHANICAL ROOM BASEMENT	ц	O	1000 SQ FT	ГОМ
∢	4	TEXTURED CEILING MATERIAL	CEILING MATERIAL OF MECHANICAL ROOM BASEMENT	ш	O	1000 SQ FT	ГОМ
∢	2	TEXTURED CEILING MATERIAL	CEILING MATERIAL OF MECHANICAL ROOM BASEMENT	ш	O	1000 SQ FT	LOW
						W W	
							a a
	8						
	ASBI-00568	FM00368419	0/11/10		PETE	PETE FISHER	

License #

FM#

Darryl Washington 803-777-2399 720 College St. Columbia, SC 29208 WashinDH@fmc.sc.edu Send lab results in PDF format as soon as possible to:

Ed Pitts 803-777-3296 720 College St. Columbia, SC 29208

Signature (

Requestor

Ty Russell 803-777-1208 720 College St. Columbia, SC 29208 NTRusse@fmc.sc.edu

EHP@fmc.sc.edu Fax # 803-777-3990



706 Gralin Street, Kernersville, NC 27284

Phone: (336) 992-1025 Fax: (336) 992-4175 Email: greensborolab@emsl.com

Attn: Darryl Washington
University of South Carolina
743 Greene Street
Columbia, SC 29208

(803) 777-7334 Phone: (803) 777-7000

Project: 01-Byrnes Building

Fax:

Customer ID: UNSC62

Customer PO:

Received: 04/18/11 9:45 AM

EMSL Order: 021102315

EMSL Proj:

Analysis Date: 4/18/2011

Test Report: Asbestos Analysis of Bulk Materials via EPA 600/R-93/116 Method using Polarized Light Microscopy

				Non-Asb	<u>estos</u>	<u>Asbestos</u>
Sample	Description	Appearance	%	Fibrous	% Non-Fibrous	% Type
1 021102315-0001	Ceiling Material	Gray/Tan/Gold Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
2 021102315-0002	Ceiling Material	Gray/Tan/Gold Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
3 021102315-0003	Ceiling Material	Gray/Tan Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
4 021102315-0004	Ceiling Material	Gray/White Fibrous Heterogeneous	45% 25%		30% Non-fibrous (other)	None Detected
5 021102315-0005	Ceiling Material	Gray/White Fibrous Heterogeneous	45% 25%		30% Non-fibrous (other)	None Detected
6 021102315-0006	Ceiling Material	Tan/White Fibrous Heterogeneous	40% 25%		35% Non-fibrous (other)	None Detected
7-Floor Tile 021102315-0007	Tile/Mastic	Gray Fibrous Heterogeneous			92% Non-fibrous (other)	8% Chrysotile

Initial report from 04/18/2011 13:48:01

Scott Combs (10)

Analyst(s)

Kristie Elliott (4)

Stephen Bennett, Laboratory Manager

or other approved signatory

EMSL maintains liability limited to cost of analysis. This report relates only to the samples reported and may not be reproduced, except in full, without written approval by EMSL. EMSL bears no responsibility for sample collection activities or analytical method limitations. Interpretation and use of test results are the responsibility of the client. This report must not be used by the client to claim product certification, approval, or endorsement by NVLAP, NIST or any agency of the federal government. Non-friable organically bound materials present a problem matrix and therefore EMSL recommends gravimetric reduction prior to analysis. Samples received in good condition unless otherwise noted.

Samples analyzed by EMSL Analytical, Inc. Kernersville, NC NVLAP Lab Code 102104-0, CA ELAP 2689, Virginia 3333-000228, West Virginia LT000321



Fax:

EMSL Analytical, Inc.

706 Gralin Street, Kernersville, NC 27284

Phone: (336) 992-1025 Fax: (336) 992-4175 Email: greensborolab@emsl.com

Attn: Darryl Washington
University of South Carolina
743 Greene Street

743 Greene Street Columbia, SC 29208

(803) 777-7334 Phone: (803) 777-7000

Project: 01-Byrnes Building

Customer ID:

Customer PO:

Received:

04/18/11 9:45 AM

EMSL Order: 021

021102315

UNSC62

EMSL Proj:

Analysis Date: 4/18/2011

Test Report: Asbestos Analysis of Bulk Materials via EPA 600/R-93/116 Method using Polarized Light Microscopy

				Non-Asl	<u>oestos</u>	<u>Asbestos</u>
Sample	Description	Appearance	%	Fibrous	% Non-Fibrous	% Type
7-Black Mastic 021102315-0007A	Tile/Mastic	Black Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
7-Orange Mastic 021102315-0007B	Tile/Mastic	Gold/Orange Non-Fibrous Heterogeneous	2% <1%	Synthetic Cellulose	98% Non-fibrous (other)	None Detected
8-Floor Tile 021102315-0008	Tile/Mastic	Gray Fibrous Heterogeneous			92% Non-fibrous (other)	8% Chrysotile
8-Black Mastic 021102315-0008A	Tile/Mastic	Black Non-Fibrous Heterogeneous	<1%	Cellulose	100% Non-fibrous (other)	None Detected
8-Orange Mastic 021102315-0008B	Tile/Mastic	Gold/Orange Non-Fibrous Heterogeneous	3% <1%	Synthetic Cellulose	97% Non-fibrous (other)	None Detected
9-Floor Tile 021102315-0009	Tile/Mastic	Gray Fibrous Heterogeneous			92% Non-fibrous (other)	8% Chrysotile
9-Mastic 021102315-0009A	Tile/Mastic	Black Non-Fibrous Heterogeneous		Cellulose Mastic Present.	100% Non-fibrous (other)	None Detected

Initial report from 04/18/2011 13:48:01

Analyst(s)

Kristie Elliott (4) Scott Combs (10) Style Bound

Stephen Bennett, Laboratory Manager or other approved signatory

EMSL maintains liability limited to cost of analysis. This report relates only to the samples reported and may not be reproduced, except in full, without written approval by EMSL. EMSL bears no responsibility for sample collection activities or analytical method limitations. Interpretation and use of test results are the responsibility of the client. This report must not be used by the client to claim product certification, approval, or endorsement by NVLAP, NIST or any agency of the federal government. Non-friable organically bound materials present a problem matrix and therefore EMSL recommends gravimetric reduction prior to analysis. Samples received in good condition unless otherwise noted.

Samples analyzed by EMSL Analytical, Inc. Kernersville, NC NVLAP Lab Code 102104-0, CA ELAP 2689, Virginia 3333-000228, West Virginia LT000321



706 Gralin Street, Kernersville, NC 27284

Fax: (336) 992-4175 Email: greensborolab@emsl.com Phone: (336) 992-1025

Attn: Darryl Washington **University of South Carolina** 743 Greene Street Columbia, SC 29208

Received:

04/18/11 9:45 AM

EMSL Order:

021102315

UNSC62

Fax: (803) 777-7334 Project:

Phone: (803) 777-7000 01-Byrnes Building

EMSL Proj:

Customer ID:

Customer PO:

Analysis Date: 4/18/2011

Test Report: Asbestos Analysis of Non-Friable Organically Bound Materials by TEM via EPA/600/R-93/116 Section 2.5.5.1

%MATRIX % NON-ASBESTOS **ASBESTOS SAMPLE ID DESCRIPTION TYPES MATERIAL APPEARANCE FIBERS**

8-Orange Mastic

021102315-0010

Insufficient Material

Insufficient mastic for NOB analysis on samples 7 & 8. No orange mastic present on sample # 9.

9-Black Mastic

021102315-0011

Insufficient Material

Insufficient mastic for NOB analysis on all 3 samples.

Initial report from 04/18/2011 13:48:01

Analyst(s)

the Bound

Stephen Bennett, Laboratory Manager or other approved signatory

This laboratory is not responsible for % asbestos in total sample when the residue only is submitted for analysis. The above report relates only to the items tested. This report may not be reproduced, except in full, without written approval by EMSL Analytical, Inc. Samples received in good condition unless otherwise noted. Samples analyzed by EMSL Analytical, Inc. Kernersville, NC



Chain of Custody EMSL Order Number (Lab Use Only):

2315

EMSL ANALYTICAL, INC. 200 ROUTE 130 NORTH CINNAMINSON, NJ 08077

PHONE: (800) 220-3678 FAX: (856) 786-5974

LAUGRATORY-PRODUCTS-TRAINING	WASCHARD PROPERTY AND ADDRESS	TOWNS THE PARTY OF	-				T NA. (600) 100 001.		
company: Un of So	ith	Carole	EMSL-Bill to: Same Different If Bill to is Different note instructions in Comments**						
Street: 743 Dreen	e D	<i>t.</i>	Third Pa	arty Billir	ng requi	res written a	uthorization from third party		
City: Cola	State/Pro	ovince: 5.C,	Zip/Postal (Code:	29	208	Country:		
Report To (Name): ft.	We	shington	Fax #:						
Telephone #: 803-915-051	1 5 9	17-0291	Email Addr	ess:	5	File			
Project Name/Number: 0 / - Br		-201	R.				7 - 19 - 19 - 19 - 19 - 19 - 19 - 19 - 1		
Please Provide Results: Fax	Email	Purchase	The state of the s						
	Turnard	ound Time (T	AT) Options	* - Plea	se Che	eck			
3 Hour 6 Hour	4 Hour	48 Hour	☐ 72 H	our		Hour [1 Week 2 Week		
*For RUSH TAT's Please \(\) Materials Science and IA	Call Ahead O TATs ai	to Confirm Lab H re in Business Da	ours and Availa vs rather than F	bility. No Hours (i.e.	t all TAT . 24 Houl	options are v r = End of Nex	valid for every test. xt Business Dav)		
Waterials Ocieties and w	THE WHITE		sbestos	1	A STATE OF THE PARTY OF THE PAR		and de paper and an arrange and a		
PCM - Air	PLM - B		3003103			TEM - Bulk			
□ NIOSH 7400		EPA 600/R-93/	116		-	TEM EP			
w/ 8hr. TWA	-	EPA NOB (<1%					B 198.4 (non-friable-NY)		
TEM- Air 4-4.5hr TAT (AHERA ONLY)		198.1 (friable-N			☐ Chatfield				
☐ AHERA 40 CFR, Part 763		198.6 (non-fria				Soil/Rock/Vermiculite			
☐ NIOSH 7402		ount		00 (<0.19	%)		RB 435 – A (0.25% sensitivity)		
☐ EPA Level II ☐ ISO 10312	Point Co	ount w/ Gravime	etric 0.25%) 🔲 100	00 (~0 19	26)		RB 435 – B (0.1% sensitivity) RB 435 – B (0.1% sensitivity)		
TEM - Water	TEM - D		7.2376) [100	00 (20.1	70)		. 1 Screening Protocol (Qualitative)		
Fibers > 10µm Waste Drinking		ovac – ASTM D	5755			Other:			
All Fiber Sizes		e-ASTM D6480				and the second s			
	Lead (F	Pb)			M	aterials Science			
Flame Atomic Absorption			ICP	SECTION PROPERTY.			n Particle ID (large particles)		
☐ Chips SW846-7000B or AOAC 974.	02	Air NIOSH				네	ticle ID (environmental dust)		
Soil SW846-7000B/7420		□non ASTM V			r C		aterial ID (solids)		
Air NIOSH 7082	D. 17.400	ASTM Wipe		OB or C	-		ed Material ID		
☐ Wastewater SM3111B or SW846-7000 ☐ ASTM Wipe SW846-7000B/7420	B//420	Soil SW846	5-6010 B or C				Testing (Tensile, Compression)		
non ASTM Wipe SW846-7000B/742	☐ Waste Wat	er SW846-60	10B or C	;	Combustion-by-products (soot, char, etc.)				
☐ TCLP SW846-1311/7420/SM 3111E		☐ TCLP SW8	46-6010B or 0	3			luorescence (elem. analysis)		
Graphite Furnace Atomic Al			ner:			Diffraction (Crystalline Part.)			
Soil SW846-7421 Wastewate					- 1		(Fibrous glass, RCF's)		
☐ Air NIOSH 7105 ☐ Drinking W	THE PARTY OF THE PARTY OF THE PARTY.	NAME AND ADDRESS OF THE OWNER, WHEN PERSON O					Size (sieve/microscopy/laser)		
	icrobic	logy				allow the same of the	stible Dust		
Wipe and Bulk Samples		Samples					aphic Examination		
☐ Mold & Fungi – Direct Examination		fold & Fungi (S	oore Trap)			Other:			
☐ Mold & Fungi Culture (Genus Only)	100000000000000000000000000000000000000	/lold & Fungi Cu					IAQ		
☐ Mold & Fungi Culture (Genus & Species) 🗆 N	/lold & Fungi (G	enus & Specie	es)		Nuisance [Dust NIOSH 0500 0600		
Bacterial Count & ID (Up to Three Types		acterial Culture &				Airborne Dust PM10 TSP			
☐ Bacterial Count & ID (Up to Five Types) ☐ MRSA		acterial Culture & Indotoxin Testin		Types)	Silica Analysis: All Species Silica Analysis - Single Species				
☐ Pseudomonas aeruginosa		I Time Q-PCR		Guide for	Code)	Silica Analysis – Single Species Alpha Quartz Cristobalite Tridymite			
Water Samples	Cod		occ / mary noar v	auluc ioi	oude)	☐ HVAC E	The state of the s		
☐ Total Coliform & E.coli (P/A)		ionella			☐ Carbon Black				
☐ Fecal Coliform (SM 9222D)	evel 1 Level 2	2 □Level 3 □	Level 4	-	☐ Airborne Oil Mist				
☐ Sewage Screen	er:					ting: Call for Kit and COC			
☐ Heterotrophic Plate Count (SM 921)	5)			55		Other:			
**Comments/Special Instructions	:		2.72						
Client Sample #'s		**************************************			T	# -10	I		
Client Sample #'s -		T				# of Samp	les: 9		
Relinquished (Client):		Date:			Time:	<u> </u>			
Received (Lab):	MINOVENNA MINORALINA	Date:	1-18-1		Time:	: 9:4			

Reset Form



2315

Building #_____Building

Type of Analysis: Lead (Asbestos Date:

Turn Around Time

Area	Sample	Material Sampled	Material Location	F/NF	Cond	Quantity	Pot to	
	m .		286				Disturb	
∢	-	CEILING MATERIAL	CEILING ABOVE 2X4 CEILING TILE ROOM 201	ш	Ŋ	960 SQ FT	LOW	
∢	2	CEILING MATERIAL	CEILING ABOVE 2X4 CEILING TILE ROOM 201	ш	g	960 SQ FT	ПОМ	_
⋖	က	CEILING MATERIAL	CEILING ABOVE 2X4 CEILING TILE ROOM 201	ш	O	960 SQ FT	ПОМ	-
4	4	2X4 WHITE CEILING TILE	CEILING MATERIAL OF ROOM 201	ш	ပ	960 SQ FT	ГОМ	-
4	2	2X4 WHITE CEILING TILE	CEILING MATERIAL OF ROOM 201	ц	g	960 SQ FT	LOW	_
٨	9	2X4 WHITE CEILING TILE	CEILING MATERIAL OF ROOM 201	ь	g	960 SQ FT	LOW	
∢	7	GREY 9X9 TILE / MASTIC	FLOORING UNDER CARPET OF ROOM 201	Ä	O	960 SQ FT	LOW	
∢	8	GREY 9X9 TILE / MASTIC	FLOORING UNDER CARPET OF ROOM 201	Ä	O	960 SQ FT	LOW	
∢	6	GREY 9X9 TILE / MASTIC	FLOORING UNDER CARPET OF ROOM 201	Ą	O	960 SQ FT	ПОМ	
		-	7					

ASBI-00568 License #

FM00361953 FM#

Send lab results in PDF format as soon as possible to:

Ed Pitts 803-777-3296
720 College St.
Columbia, SC 29208
EHP@fime.se.edu
WashinDH@fme.se.edu

Ty Russell 803-777-1208 720 College St. Columbia, SC 29208 NTRusse@fmc.sc.edu

Signature

LINDA CICCIA Requestor_

720 College St. Columbia, SC 29208 EHP@fmc.sc.edu Fax # 803-777-3990

Reading No	Timo	Typo	Duration Units	Sequence	Component	Substrata	Side Condition	Color	Sito	Inspector	Floor	Poom Miso	1 Mico 2 Poculto	Donth Indox	Action Level PbC	PbC Error PbL	PbL Error PbK	PbK Error
	6/29/2009 ⁻	7.1	3.55 mg / cm ^2	•	WALL	DRYWALL				s D Washington		730	Negative	Deptii ilidex	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.9
	6/29/2009		3.24 mg/cm ^2		WALL	DRYWALL	PEELING			s D Washington		712	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.82
_		10:09 PAINT	•		WALL	DRYWALL	PEELING		,	s D Washington		724	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	1.32
		10:10 PAINT	_		WALL	DRYWALL	PEELING		-	s D Washington		719	Negative	2.15	0.7 < LOD	0.04 < LOD	0.04 < LOD	1.45
_	6/29/2009		2.27 mg/cm ^2		WALL	METAL	INTACT		,	s D Washington		702	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	2.1
		10:11 PAINT	J		WALL	METAL	INTACT		-	s D Washington			Negative	2.93	0.7 < LOD	0.04 < LOD	0.04 < LOD	1.95
	6/29/2009		2.92 mg/cm ^2		WALL	DRYWALL	INTACT		,	s D Washington		704	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	1.32
119	6/29/2009	10:14 PAINT	8.44 mg/cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	Sixth	605	Negative	3.15	0.7 < LOD	0.04 < LOD	0.04 < LOD	0.65
120	6/29/2009	10:15 PAINT	3.56 mg/cm ^2	Final	WALL	DRYWALL	INTACT		•	s D Washington		604	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.81
121	6/29/2009	10:15 PAINT	3.25 mg/cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	Sixth	620	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.82
122	6/29/2009	10:16 PAINT	3.57 mg/cm ^2	Final	WALL	DRYWALL	INTACT			s D Washington		601	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.81
123	6/29/2009	10:16 PAINT	3.56 mg/cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	Sixth	616	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.89
124	6/29/2009	10:17 PAINT	3.24 mg/cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	Sixth	614 a	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.86
125	6/29/2009	10:18 PAINT	2.6 mg / cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	Sixth	613	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	1.41
126	6/29/2009	10:19 PAINT	3.24 mg / cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	Sixth	609	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.82
127	6/29/2009	10:20 PAINT	7.45 mg / cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	Sixth	617	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.58
128	6/29/2009	10:22 PAINT	4.88 mg / cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	FIFTH	518	Negative	5.08	0.7 < LOD	0.04 < LOD	0.04 < LOD	0.62
129	6/29/2009	10:23 PAINT	3.26 mg / cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	FIFTH	501b	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.85
130	6/29/2009	10:23 PAINT	3.22 mg / cm ^2	Final	WALL	DRYWALL	INTACT		,	s D Washington		502	Negative	1.44	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.84
131	6/29/2009	10:24 PAINT	5.84 mg / cm ^2	Final	WALL	DRYWALL	INTACT			s D Washington		504	Negative	1.71	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.64
132	6/29/2009	10:25 PAINT	3.24 mg / cm ^2		WALL	METAL	INTACT	WHITE	001 Byrne	s D Washington	FIFTH	509	Negative	3.89	0.7 < LOD	0.06 < LOD	0.06 < LOD	1.2
133	6/29/2009	10:25 PAINT	2.58 mg / cm ^2	Final	WALL	METAL	INTACT			s D Washington		510	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	2.1
		10:26 PAINT	J		WALL	METAL	INTACT			s D Washington		511b	Negative	1.17	0.7 < LOD	0.03 < LOD	0.03 < LOD	2.1
		10:27 PAINT	•		WALL	METAL	INTACT			s D Washington		512a	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	2.25
	6/29/2009		4.22 mg / cm ^2		WALL	METAL	INTACT			s D Washington		513	Negative	2.29	0.7 < LOD	0.04 < LOD	0.04 1.1	
_		10:41 PAINT	5		WALL	DRYWALL	INTACT		,	s D Washington			Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	1.3
		10:41 PAINT	J		WALL	DRYWALL	INTACT			s D Washington			Null	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	1.35
		10:41 PAINT	•		WALL	DRYWALL	INTACT		-	s D Washington			Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	1.26
	6/29/2009		3.24 mg / cm ^2		WALL	DRYWALL	INTACT			s D Washington			Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	8.0
	6/29/2009		2.91 mg/cm ^2		WALL	DRYWALL	INTACT		-	s D Washington			Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	1.23
		10:43 PAINT	•		WALL	DRYWALL	INTACT		,	s D Washington			Negative	4.15	0.7 < LOD	0.06 < LOD	0.06 < LOD	0.95
	6/29/2009		3.87 mg / cm ^2		WALL	DRYWALL	INTACT			s D Washington			Negative	2.65	0.7 < LOD	0.04 < LOD	0.04 < LOD	1.03
	6/29/2009	-	1.63 mg / cm ^2		WALL	DRYWALL	INTACT		,	s D Washington			Null	10	0.7 < LOD	0.78 < LOD	0.78 < LOD	2.21
	6/29/2009		4.54 mg / cm ^2		WALL	DRYWALL	INTACT			s D Washington			Negative	6	0.7 < LOD	0.13 < LOD	0.13 < LOD	0.9
_	6/29/2009		4.87 mg / cm ^2		WALL	DRYWALL	INTACT		•	s D Washington			Negative	3.1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.9
	6/29/2009		3.58 mg / cm ^2		WALL	DRYWALL	INTACT		-	s D Washington			Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.8
		10:47 PAINT	_		WALL	DRYWALL	INTACT		-	s D Washington			Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.63
	6/29/2009		2.91 mg/cm ^2		WALL	DRYWALL	INTACT		,	s D Washington			Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	1.28
150	6/29/2009	10:48 PAINT	4.53 mg / cm ^2	Final	WALL	DRYWALL	INTACT	WHITE	001 Byrne	s D Washington	FOURTH	l 402	Negative	1	0.7 < LOD	0.03 < LOD	0.03 < LOD	0.69