

CITY OF LIGHTS

City of Aurora, Illinois

Invitation to Bid 18-63

Protective Gear For the Aurora Fire Department

BID PROPOSALS DUE

Wednesday, October 31, 2018 at 2:00 p.m.

City of Aurora
City Clerk's Office, 2nd Floor
44 E Downer Place
Aurora, Illinois

CITY OF AURORA, ILLINOIS

INVITATION TO BID

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Jolene Coulter
Director of Purchasing

RICHARD C. IRVIN Mayor

CITY OF AURORA INVITATION TO BID 18-63 PROTECTIVE GEAR FOR THE AURORA FIRE DEPARTMENT

The City of Aurora invites you to bid on the anticipated purchase of protective apparel for the Aurora Fire Department.

Sealed Bid proposals will be received at the office of the City Clerk, 44 East Downer Place, Aurora, Illinois 60507-2067 until 2:00 p.m., Wednesday, October 31, 2018 to determine proposals for the anticipated purchase of the above named items.

Attached please find specifications and other pertinent documents necessary for you to respond to this Invitation to Bid.

The contract is for a one-year term, with two 1-year extensions, subject to mutual consent between the City of Aurora and the Supplier.

DO NOT SEND OR DELIVER BIDS PROPOSALS to the Purchasing Division Office.

All proposals are to be submitted on the bid proposal form provided entitled: "Bid Proposal Form 18-63 Protective Gear".

Each bid must be placed in an envelope, sealed, and clearly marked on the outside: "18-63 Bid for Protective Gear".

Inquiries and/or questions pertaining to the provisions and specifications of this bid package shall be directed to the Director of Purchasing, in writing at PurchasingDL@aurora-il.org. Questions will be accepted until 8:00 am, Tuesday, October 23, 2018. Questions will be answered via addendum and posted to the City's website at https://www.aurora-il.org/bids.aspx by 12:00 pm, Thursday, October 25, 2018. NO questions will be accepted or answered verbally. No questions will be accepted or answered after October 23, 2018, 2018 8:00 am cut-off date/time. It is the bidder's responsibility to check the website before submitting their bid.

The City of Aurora has a local preference ordinance that would apply to this contract.

The City of Aurora encourages minority business firms to submit bids and encourages the successful firm to utilize minority businesses as applicable.

A bid bond in the amount of 10% of the bid price is required to be furnished with the bid presented.

Any Bidder who owes the City money may be disqualified at the City's discretion.

The City of Aurora reserves the right to reject any or all Bids, or parts thereof, and to waive any technicality, informality or irregularity in the Bids received, and to disregard all nonconforming or conditional Bids or counter-proposals and to hold the best Bids for ninety (90) days from the opening date set forth above. The City further reserves the right to award the Bid to the lowest responsible Bidder whose offer best responds in quality, fitness and capacity to the requirements of the proposed work or usage and therefore is in the best interest of the City.

Esther L. Phillips

Esther L. Phillips

Director of Purchasing

BIDDER'S CERTIFICATION

I/We hereby certify that:

- A. A complete set of bid papers, as intended, has been received, and that I/We will abide by the contents and/or information received and/or contained herein.
- B. I/We have not entered into any collusion or other unethical practices with any person, firm, or employee of the City which would in any way be construed as unethical business practice.
- C. I/We have adopted a written sexual harassment policy which is in accordance with the requirements of Federal, State and local laws, regulations and policies and further certify that I/We are also in compliance with all equal employment practice requirements contained in Public Act 87-1257 (effective July 1, 1993) and 775 ILCS 5/2-105 (A).
- D. I/We operate a drug free environment and drugs are not allowed in the workplace or satellite locations as well as City of Aurora sites in accordance with the Drug Free Workplace Act of January, 1992.
- E. The Bidder is not barred from bidding on the Project, or entering into this contract as a result of a violation of either Section 33E-3 or 33E-4 of the Illinois Criminal Code, or any similar offense of "bid rigging" or "bid rotating" of any state or the United States.
- F. I/We will abide by all other Federal, State and local codes, rules, regulations, ordinances and statutes.

010	Δ
COMPANY NAME DINGS Parties Gre	oup don Vings Fin Company
ADDRESS 243 8- Main	
CITY/STATE/ZIP CODE Amby JL	413/0
NAME OF CORPORATE/COMPANY OFFICIAL	Nicholas C. Oings PLEASE TYPE OR PRINT CLEARLY
TITLE CEO	
AUTHORIZED OFFICIAL SIGNATURE	
DATEO	Subscribed and Sworn to
TELEPHONE (\$15) \$57-2000	Before me this 3/ day
FAX No. (\$15) 857- 3700	of October, 2018,
OFFICIAL SEAL JANELLE M NOBLE NOTARY PUBLIC - STATE OF ILLINOIS MY COMMISSION EXPIRES:06/12/19	Notary Public

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STATE OF ILLINOIS)	
)	SS.
County of Kane)	

BIDDER'S TAX CERTIFICATION

(BIDDER'S EXECUTING OFFICER), being first duly sworn on oath, deposes and states that all statements made herein are made on behalf of the Bidder, that this despondent is authorized to make them and that the statements contained herein are true and correct.

Bidder deposes, states and certifies that Bidder is not barred from contracting with any unit of local government in the State of Illinois as result of a delinquency in payment of any tax administered by the Illinois Department of Revenue unless Bidder is contesting, in accordance with the procedures established by the appropriate statute, its liability for the tax or the amount of the tax, all as provided for in accordance with 65 ILCS 5/11-42.1-1.

	in accordance with 65 ILCS 5/11-42.1-1.
	DATED this 31 day of Octobe, 2018.
	(Signature of Bidder's Executing Officer) Vielulas C. Divines (Print name of Bidder's Executing Officer) CEO (Title)
	ATTEST/WITNESS:
	Title BSA (octdinator
<	Subscribed and sworn to before me this 31 day of Other, 2018. Notary Public
	(SEAL) OFFICIAL SEAL JANELLE M NOBLE NOTARY PUBLIC - STATE OF ILLINOIS

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CITY OF AURORA, ILLINOIS INSTRUCTIONS TO BIDDERS

01. REQUIREMENTS OF BIDDER

The successful Bidder may be required to (a) enter into a fully signed contract in writing with the City of Aurora covering matters and things as are set forth in the Bid Package; and (b) carry insurance acceptable to the City covering public liability, property damage and workers compensation.

02. ACCEPTANCE OF BIDS

- a. Bidder must submit three (3) complete, sealed, signed and attested copies of the bid, one (1) of which shall be a complete bound copy and one (1) of which shall be complete, identical, unbound copy of the bid, and shall have provided all requested information, and submitted all appropriate forms, certificates, affidavits and addendum acknowledgements in each copy in order to be considered responsive. Both copies shall be the forms with the original signatures.
- b. The City reserves the right to reject any and all Bids or parts thereof and to waive any technicalities and irregularities in the bidding and to disregard all nonconforming or conditional Bids or counter-proposals and to hold the Bid proposals for ninety (90) days from the opening date set forth above. Bidder agrees to accept a notice of award, if selected, based on the terms of this Bid in the event that a notification of award is received on or before expiration of the 90-day time period. The City reserves the right to cancel the Bid at any time, without liability for any loss, damage, cost or expense incurred or suffered by any Bidder as a result of that cancellation. Each Bidder is solely responsible for the risk and cost of preparing and submitting a Bid.
- c. Although price is a major consideration, product quality, references, service, delivery time and past experience, if applicable, will also be considered. No Bid will be considered unless the Bidder shall furnish evidence satisfactory to the City that he has the necessary facilities, abilities, experience, equipment, and financial and physical resources available to fulfill the conditions of the contract and execute the Work should the contract be awarded to him. Bid documents which are not responsive to the requirements herein may not be considered by the City for an award of the contract.

The contract will be awarded to the lowest responsible Bidder. In determining the responsibility of any Bidder, the City may take into account other factors in addition to financial responsibility, such as past records of its or other entities transactions with the Bidder, experience, ability to work cooperatively with the City and its staff, adequacy of equipment, ability to complete performance within necessary time limits, and other pertinent considerations such as, but not limited to, reliability, reputation, competency, skill, efficiency, facilities and resources.

The Bid will be awarded in the City's best interests based on these and other legallyallowable considerations. The City and its representatives and agents may make any investigations deemed necessary to determine the ability of the Bidder to perform the Work. The Bidder shall furnish any information and data requested by the City for this purpose.

03. RECEIPT OF BIDS

- a. It is suggested that respondents allow a minimum of four (4) days for delivery through U.S. mail, or Bids may be delivered to the Office of the City Clerk in person. Overnight courier is acceptable provided timely receipt of Bids. The Bidder assumes responsibility for late delivery of the mail. It is the sole responsibility of the Bidder to see that his Bid is received in the proper time.
- b. Any Bid received by the Office of the City Clerk after 2:00 pm, Wednesday, October 31, 2018 shall be rejected.
- c. All Bids must be submitted upon the blank forms attached herein with all blank spaces filled in and any alterations or erasures explained. Bids that contain any omissions, erasures, or alterations, or that contain any additions or omissions of items not called for in the Bid Package, or that contains irregularities of any kind, may be rejected as informal. Bids shall be in strict conformity with the Bid Package and any applicable Addenda. Only Bids which are made out upon the Bid Form will be considered. Partial or incomplete Bids will not be considered.

04. WITHDRAWAL OF BIDS

Bidders may not withdraw their Bid after the Bid opening without the approval of the Purchasing Director. Requests to withdraw a Bid must be in writing and properly signed. Bidders may, however, without prejudice, modify or withdraw its Bid by written request, provided that the request is received by the City Clerk prior to the scheduled Bid opening and at the address to which Bids were to be submitted. Following withdrawal or modification of its Bid, Bidder may submit a new Bid, provided it is received by the City Clerk prior to the bid due date. No Bid will be opened which is received after the time and date scheduled for the Bids to be received.

05. BID DEPOSIT

Each Bidder shall deposit with his bid a bid guarantee consisting of a bank draft, bid bond, cashier's check, or certified check drawn on a good and solvent National or State Bank and payable to the order of the city, in an amount not less than 10% of the total amount of the bid submitted, as a guaranty that in case the Bidder's bid is accepted, the Bidder shall within one day after the date of such acceptance and notification thereof, deliver to the city a contract signed and executed by the contractor, proper insurance certificates and a Performance Bond in one hundred percent of the contract sum furnished by a responsible bonding company acceptable to and written upon forms prepared or approved by the city as security for payment the faithful performance of the contract. All bid deposits will be retained by the city until a bid award is made, at which time the bid deposit will be promptly returned to the unsuccessful Bidders. The bid deposit of the successful Bidder will be retained until the equipment, goods or services have been received or completed and found to be in compliance with the specifications. Performance by the contractor shall not be considered complete, until final inspection and acceptance by the city of the contractor's work. Final inspection shall occur within 30 days after the actual completion of the work. Execution of the contract is contingent upon receipt of an acceptable Performance Bond and any required certificates of insurance. Upon failure to meet the requirements of this paragraph, the Bidder shall forfeit the amount deposited as liquidated damages and no mistakes or errors on the part of the Bidder shall excuse the Bidder or entitle him to a return of the aforementioned amount.

06. BOND AND INSURANCE

The requirement of a labor and material payment and performance bond will be waived for purposes of this contract.

07. CITY'S AGENT

The Purchasing Director, or his delegate, shall represent and act for the City in all matters pertaining to the Bid proposal and contract in conjunction thereto.

08. INVESTIGATION

It shall be the responsibility of the Bidders to make any and all investigations necessary to become thoroughly informed of what is required and specified in the Bid. No plea of ignorance by the Bidders of conditions that exist or may hereafter exist as a result of failure or omission on the part of the Bidder to make the necessary examinations and investigations will be accepted as a basis for varying the requirements of the City of the compensation to the Bidder.

Each Bidder submitting a Bid is responsible for examining the complete Bid Package and all Addenda, and is also responsible for informing itself of all conditions that might in any way affect the cost or the performance of any Work. Failure to do so will be at the sole risk of the Bidder, and no relief will be given for errors or omissions by the Bidder. If awarded the contract, the Bidder will not be allowed any extra compensation by reason of any matter or thing concerning which such Bidder should have fully informed himself, because of his failure to have so informed himself prior to the bidding. The submission of a Bid shall be construed as conclusive evidence that the Bidder has made such examination as is required in this section and that the Bidder is conversant with local facilities and difficulties, the requirements of the Bid Package documents, and of pertinent, local, state and federal laws and codes, prevailing local labor and material markets, and has made due allowance in its Bid for all contingencies. Before any award is made of the contract to the Bidder, the Bidder may be required to, upon request of the City, furnish information concerning his performance record in his capacity to complete the Work in an efficient and timely manner.

09. BIDDER QUALIFICATION

Only bids from established contractors for work similar in scope to work herein shall be considered; the City reserves the right to request specific reference information prior to award. Bidder shall demonstrate that he has adequate and appropriate manpower, tools and equipment to respond and perform in accordance with the provisions herein.

The City may, at its option, disqualify a bidder and reject his bid for cause. Reasons deemed to be sufficient for this action shall include, but not be limited to, the following:

- Evidence of collusion among bidders.
- Receipt of more than one bid on any project from an individual, or from a corporation. This restriction does not apply to subcontractors.
- Default on any previous contract.
- For unreasonable failure to complete a previous contract within the specified time or for being in arrears on an existing contract without reasonable cause for being in arrears.

- Inability to perform as revealed by an investigation of the Bidder's financial statement, experience and/or plant and equipment.
- Any bidder who owes the city money may be disqualified at the City's discretion.

10. ALTERNATE BIDS

The specifications are prepared to describe the goods and/or service which the City deemed to be in the best interest to meet its performance requirements. Bidders desiring to submit a Bid on items which deviate from the stated specifications, but which they believe to be equal, may do so, but all specification deviations must be clearly stated on the form provided in the Bid proposal package. The Purchasing Director reserves the right to rule upon specification deviation in a manner as best befits the needs of the City. If a Bidder wishes to submit more than one Bid, each Bid, after the first, is to be considered an alternate. THESE BIDS MUST BE PLACED IN SEPARATE ENVELOPES. THE ENVELOPE AND THE BID PROPOSAL PAGE MUST BE PLAINLY MARKED "ALTERNATE BID". The Purchasing Director will reject all deviations that amount to a material nonconformity with the specifications of the Bid.

11. BID AWARD

Except as otherwise may be stated in the Specifications, Bid award shall be made to the lowest responsible Bidder meeting the requirements and/or intent of the specifications at the net delivered price(s) shown and best responding to the needs of the City, in the City's sole discretion. However, if the Bidder modifies limits, restricts or subjects his Bid proposal to conditions that would change the requirements of the specifications, this would be considered a conditional or qualified Bid proposal and will not be accepted. The City reserves the right to delete any Bid item listed in the Bid Package.

12. PRICES

- a. Unit prices shall be shown for each unit on which there is a Bid, and shall include all packing, crating, freight and shipping charges to destination unless otherwise stated in the Bid proposal.
- b. Unit prices shall not include any local, state or federal taxes. In case of mistake in extension of price, unit price shall govern. All prices must be typewritten or written in black ink. (The party signing the Bid or his authorized representative must initial any alteration in ink.)

13. DISCOUNTS

Cash discounts for payment thirty (30) days or more may be considered in awarding the Bid. Discounts of less than thirty (30) days will not be considered in the Bid evaluation. Where the net Bid is equal to a Bid with the cash discount deducted, the award shall be made to the net Bid. Discounts will be figured from the date of receipt of a proper invoice.

14. TAXES

The City of Aurora is exempt, by law, from paying State and City Retailer's Occupation Tax, State Service Occupation Tax, State Use Tax and Federal Excise Tax upon City works and purchases. The City of Aurora's Sales Tax Exemption Number is E9996-0842-07.

15. PAYMENTS

The City, after inspection and acceptance, and in consideration of the faithful performance by the Bidder, agrees to pay for the completion of the work embraced in this Contract, within thirty (30) days of the receipt of the invoice.

Time, in connection with any discount offered, will be computed from the date of delivery to the City or from the date a correct invoice is received by the City of Aurora Purchasing Division, if the latter date is later than the date of delivery.

Prices will be considered NET, if no payment discount is shown.

The successful Bidder shall submit invoices via e-mail to PurchasingDL@aurora-il.org or to the following address:

City of Aurora Attn: Purchasing Division 44 E. Downer Place Aurora, IL 60507

16. **DEFAULT**

In case of default by successful Bidder, the City will procure articles or service from other sources and hold the contractor responsible for any excess cost incurred as provided for in Article 2 of the Uniform Commercial Code.

17. CANCELLATION

The City reserves the right to cancel the whole or any part of the contract if the Bidder fails to perform any of the provisions in the contract or fails to make delivery within the time stated. The Bidder will not be liable to perform if situations arise by reason of strikes, acts of God or public enemy, acts of the City, fires or floods.

18. SIGNATURES

Each Bid must be signed by the Bidder with his/her usual signature. Bids by partnerships must be signed with the partnership name by all members of the partnership, or an authorized representative, followed by the signature and title of the person signing. Bids by corporations must be signed with the name of the corporation, followed by the signature and title of the person authorized to bind it in the matter. All signatures must be in ink.

When a corporation submits a Bid, its agent must present legal evidence that he has lawful authority to sign said Bid and that the corporation has a legal existence. In the event that any corporation organized and doing business under the laws of any foreign state is the successful Bidder, such corporation must present evidence before any contract is executed that it is authorized to do business in the State of Illinois. Bids by corporations must be executed in the corporate name by the President or a Vice President (or other corporate officer accompanied by evidence of authority to sign), and the signature must be attested by the Secretary or an Assistant Secretary, and the corporate seal must be affixed. The corporate address and state of incorporation must be shown below the signature. Bids by partnerships must be executed in the

partnership name and signed by a partner whose title must appear under the signature, and the official address of the partnership must be shown below the signature. Any corrections to entries made on the Bid forms shall be initialed by the person signing the Bid. When requested by the City, satisfactory evidence of the authority of any signature on behalf of the Bidder shall be furnished.

19. SPECIAL CONDITIONS

Wherever special conditions are written into the Special Conditions and Specifications which are in conflict with conditions stated in these Instructions to Bidders, the conditions stated in Special Conditions and Specifications shall take precedence.

20. PERMITS AND LICENSES

The successful Bidder shall obtain, at its own expense, all permits and licenses which may be required to complete the contract.

21. PATENTS

The successful Bidder agrees to indemnify, protect, defend, and save the City of Aurora and its officers and employees, harmless against any demand for payment for the use of any patented material process, article, or device that may enter into the manufacture, construction, presentation or form a part of the Work covered by the contract.

22. SAMPLES

Samples of items, when required, must be submitted within the time specified and at no expense to the City; and if not destroyed in testing, they will be returned at the Bidder's request and expense. Samples which are not requested for return within thirty (30) days will become the property of the City.

23. **DEMONSTRATIONS**

Bidders are required, if requested to do so, to effect a demonstration of the item(s) being Bid if the City feels it has insufficient knowledge of the item's operations or performance capability. Such demonstration must be at a site which is most convenient and agreeable to the effected City personnel.

24. REFERENCES

Sufficient references of all like public and/or private agencies must be presented on a separate sheet and attached to this Bid. Listing must include company name, contact person, telephone number and date purchased. All Bidders, as a condition of and prior to entry into a contract, agree that a complete background investigation of the principals of the Bidder and all employees who will work on the project may be made. Bidders agree to cooperate with the appropriate City of Aurora personnel to supply all information necessary to complete these investigations. The City of Aurora in its complete discretion may disqualify any Bidder, including low Bidder, and may void any contract previously entered into based on its background investigation.

DATA

Complete and detailed brochures and specifications for vehicles equipment, materials, goods, supplies and/or services to be furnished must be included with each Bid.

26. SEQUENCE

The Bid form(s) shall be the top (1st) sheet(s) of the Bid proposal package returned to the City for consideration. All other sheets and/or documentation shall follow.

27. COMPLIANCE WITH LAWS AND REGULATIONS

The Bidder shall at all times observe and comply with all Federal, State, Municipal and other local laws, ordinances, regulations, and requirements which in any manner affect the conduct of the Work, and with all Federal, State and local laws and policies of non-discrimination, sexual harassment, and others applicable thereto; and all such orders or decrees as exist at the present and which may be enacted later, of bodies or tribunals having jurisdiction or authority over the Work, and no plea of misunderstanding or ignorance thereof will be considered. He shall indemnify and save harmless the City and all its officers, agents, employees and servants against any requirement, claim or liability arising from or based on the violation of any such law, ordinance, regulation, order or decree, whether by himself or his employees.

28. PATENTED DEVICES, MATERIALS, AND PROCESSES

It is mutually understood and agreed that without exception contract prices are to include all royalties and costs arising in the Work. It is the intent that whenever the Bidder is required or desires to use any design, device, material, or process covered by letters or patent or copyright, the right of such use shall be provided for by suitable legal agreement with the patent owner. The Bidder in all cases shall indemnify and save harmless the City from any and all claims for infringement by reason of the use of any such patent design, device, materials, or process, to be performed or used under the contract, and shall indemnify and save harmless the said City for any costs, expenses, attorney's fees, and damages which it may be obligated to pay, by reason of any such infringement at any time during the prosecution or after the completion of the Work.

29. INSURANCE AND HOLD HARMLESS PROVISION

At the Bidder's expense, the Bidder shall secure and maintain in effect throughout the duration of this contract, insurance of the following kinds and limits to cover all locations of the Bidder's operations. The Bidder shall furnish Certificates of Insurance to the City before starting or within ten (10) days after the execution of the contract, whichever date is reached first. All insurance policies shall be written with insurance companies approved by the City of Aurora and licensed to do business in the State of Illinois and having a rating of not less than A IX, according to the latest edition of the A.M. Best Company; and shall include a provision preventing cancellation of the insurance policy unless thirty (30) days prior written notice is given to the City. This provision shall also be stated on each Certificate of Insurance as: "Should any of the above described policies be canceled before the expiration date thereof, the issuing company will endeavor to mail 10 days written notice to the certificate holder named to the left".

If requested, the awardee of this proposal will give the City a copy of the insurance policies. The policies must be delivered to the City within two weeks of the request.

The limits of liability for the insurance required shall provide coverage for not less than the following amount, or greater where required by law:

- (1) Worker's Compensation Insurance Statutory amount.
- (2) General Liability Insurance:
 - (a) \$1,000,000 per occurrence and \$2,000,000 general aggregate
 - (b) \$500,000 per occurrence for Property Damage
 - (c) \$1,000,000 per occurrence for Personal Injury
- (3) Auto Liability Insurance:
 - (a) Bodily injury with limits not less than \$1,000,000
 - (b) Property damage with limits not less than \$500,000
- (4) Umbrella excess liability of \$1,000,000 per occurrence, \$2,000,000 aggregate

The Bidder shall include the City as a primary, non-contributory additional named insured on both General and Auto Liability Insurance policies and indicate said status on any Certificates of Insurance provided to the City pursuant to this project. All insurance premiums shall be paid without cost to the City.

The Bidder agrees to indemnify and save harmless the City of Aurora, their agents and employees from and against all loss and expenses (including costs and attorneys' fees) by reason of liability imposed by law or claims made upon the City of Aurora for damages because of bodily injury, including death at any time resulting therefrom sustained by any person or persons or on account of damage to property, including loss of use thereof, arising out of or in consequence of the performance of this project work, whether such claims or injuries to persons or damage to property be due to the negligence of the Bidder or his Subcontractors. The Bidder shall assume total risk and shall be responsible for any and all damages or losses caused by or in any way resulting from the work and provide all insurance necessary to protect and save harmless the City of Aurora and its employees.

30. WORKERS COMPENSATION ACT

The Bidder further agrees to insure his employees and their beneficiaries and to the employees and the beneficiaries of any subcontractor employed from time to time by him on said Work, the necessary first-aid, medical, surgical, and hospital services and any compensation provided for in the Workers Compensation Act of the State of Illinois that is or may be in force in the State.

Such insurance shall be placed by said Bidder in a company or association (to be approved by the City and to be accepted by the Council thereof) authorized under the laws of the State of Illinois to insure the liability above specified.

Said Bidder hereby further agrees to indemnify, keep and save harmless said City from all action, proceedings, claims, judgments, awards, and costs, loss, damages, expenses, and attorney's fees which may in any way come against said City by reason of any accidental injuries or death suffered by any of his employees or the employees of any subcontractor employed by

him in and about the performance of the Work provided for in the contract, and any and all liability resulting thereupon; and said Bidder, in case of any suit, action, or proceeding on account of any or all of the foregoing shall defend the same for and on behalf of said City and indemnify the City therefore, and pay the amount of any and all awards and final judgments and orders rendered and entered therein, together with all loss, costs, damages, attorney's fees, and expenses incurred therein. Said Bidder shall be the sole employer of its employees and workers, and in no way so shall the City be considered a joint employer of same under any circumstance.

31. SUBLETTING OR ASSIGNMENT OF WORK

If the Bidder sublets the whole or any part of the Work to be done under the contract, with or without the written consent of the City, he shall not, under any circumstances, be relieved of his liabilities and obligations. All transactions of the City shall be with the Bidder; subcontractors shall be recognized only in the capacity of employees or workmen and shall be subject to the same requirements as to character and competence. In case any party or parties, to whom any work under the contract shall have been sublet, shall disregard the directions of the City or his duly authorized representatives, or shall furnish any unsatisfactory Work or shall fail or refuse in any way to conform to any of the provisions or conditions of the contract, then in that case, upon the written order of the City, the Bidder shall require said party or parties in default to discontinue Work under the contract. Said Work shall be corrected or made good and shall be continued and completed by the said Bidder or by such other party or parties as are approved by the City, in the manner and subject to all of the requirements specified in the contract.

32. MINORITY PARTICIPATION

The City of Aurora encourages minority business firms to submit proposers and encourages the successful contract Proposer to utilized minority businesses as sub-contractors for supplies, equipment, services and construction.

33. LOCAL BIDDER PREFERENCE

O18-070 approved August 28, 2018 defines "Local business" to mean a vendor or contractor who has a valid, verifiable physical business address located within the corporate boundaries of the City of Aurora at least twelve months prior to a bid or proposal opening date, from which the vendor, contractor or consultant operates or performs business on a daily basis, including manufacturing production or distribution. The business must disclose the percentage of workforce in the City of Aurora; be registered with the City of Aurora, if applicable; be subject to City of Aurora taxes (inclusive of sales taxes); be current with property tax payments and sales tax payments; not have any outside cited code violations; not have any outstanding debts to the City of Aurora; have adequately qualified and trained staff to service the bid of interest.

34. PROSECUTION OF WORK

The Bidder shall begin the Work to be performed under the contract no later than ten (10) days after the execution and acceptance of the contract, unless otherwise provided. The Work shall be conducted in such a manner and with sufficient materials, equipment and labor as is considered necessary to insure its completion within the time specified in the contract. The Bidder shall solely be fully responsible for complying with State and local prevailing wage requirements in accordance with the Bidders Certification, and for all wage rate and hour regulations and applications.

35. GUARANTEES AND WARRANTIES

All guarantees and warranties required shall be furnished by the bidder if awarded the Contract and shall be delivered to the Purchasing Division before final payment on the Contract is issued. Information describing such guarantees and warranties shall be included as part of the bid. The bidder shall also specify any guarantees or warranties which are available for purchase by the City and shall transfer the same in writing upon completion of the work, along with a Bill of Sale as may be appropriate.

36. QUESTIONS

Inquiries and/or questions pertaining to the provisions and specifications of this bid package shall be directed to the Director of Purchasing, in writing at PurchasingDL@aurora-il.org. Questions will be accepted until 8:00 am, Tuesday, October 23, 2018. Questions will be answered via addendum and posted to the City's website at https://www.aurora-il.org/bids.aspx by 12:00 pm, Thursday, October 25, 2018. NO questions will be accepted or answered verbally. No questions will be accepted or answered after October 23, 2018, 2018 8:00 am cut-off date/time.

It is the responsibility of the interested bidder to assure they have received addendum, if any issued, and acknowledge such receipt where indicated.

CITY OF AURORA SPECIFICATIONS FOR 18-63 PROTECTIVE GEAR FOR THE AURORA FIRE DEPARTMENT

GENERAL

The City of Aurora is soliciting bids for Firefighters' protective clothing (coats and pants) for the Aurora Fire Department covering the 2019 fiscal year (January 1, 2019 through December 31, 2019). Bids are also being solicited for general protective clothing items and other miscellaneous replacement items.

SECTION 1.0 - SCOPE

These specifications are for the purchase of Protective Clothing for Fire Fighting Operations for the Aurora Fire Department.

This contract shall cover the City of Aurora's 2019 fiscal year (January 1, 2019 through December 31, 2019). Bidders shall provide an option for renewal, and shall be limited to two-(1) year contracts. The City will not be bound to an approved purchase contract if funds are not designated by the City Council for this specific purpose for the 2019 fiscal year or any subsequent renewal year.

SECTION 2.0 – PRICING

Bid sheets include the following information:

Item #: The Aurora Fire Department tracking number.

Description: A brief description of the specified item.

Manufacturer: The maker of the item.

Vendor Product #: The vendor's catalog/inventory/I.D. number for the item.

Unit Price: The price per unit of the specified item, <u>INCLUDING SHIPPING</u>.

Estimated Units: The anticipated quantity of the item that will be purchased in fiscal year 2019.

Total Price: The total cost (Unit Price X Estimated Units) of the specified item, INCLUDING

SHIPPING.

Delivery: Estimated delivery time.

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SECTION 3.0 – EVALUATED EQUALS

Vendors desiring to bid an alternative product to those specified are to submit one (1) sample of each item on which they will be offering a price quote. Evaluation will be conducted by a committee of firefighters and Fire Department staff personnel. For comparison purposes, the bunker coat shall be chest size 46, sleeve length 29, and bunker pants will be waist size 36, inseam 30. Fire boots shall be men's size 10.5.

Samples shall be delivered not less than seven (7) days prior to the bid opening to the attention of:

Deputy Chief Aurora Fire Department 75 N. Broadway Aurora, IL 60505

Included with each sample shall be information concerning technical specifications, brochures and other information describing features of the sample item.

Vendors will be responsible for retrieving their samples after the date the bid is awarded.

SECTION 4.0 – EXCEPTIONS

All deviations from these specifications shall be so stated on the returned bid. Unless so stated by the bidder, the City shall assume that all requirements have been met. Samples of alternative products shall be provided as outlined in 3.0 above.

Without exception, all items shall meet the requirements of the current edition of NFPA #1971, Protective Clothing for Fire Fighting Operations, including standards dealing with blood borne pathogen protection.

SECTION 5.0 – WARRANTY AND REPAIR SERVICE

Vendors shall describe in detail any and all warranties and shall describe how warranty repairs will be provided. Since maintaining a high level of protection for firefighters is a high priority for the Aurora Fire Department, all repairs shall be completed expeditiously. There shall be no additional charges to the City of Aurora or the Aurora Fire Department for the cleaning of fire gear before warranty repairs can be completed.

SECTION 6.0 – AWARD OF BID

The items detailed are also considered original issue to new personnel and routine replacement items throughout the fiscal year. No minimum order is guaranteed.

Vendors may choose to submit a bid on all items or on selected items only.

Items will be awarded separately to the lowest responsible bidder for each item, with the exception of Items #1 and #2, which make up an integrated firefighting ensemble, and will be awarded as a single unit.

The criteria used for evaluating proposals received will be:

- 1. Design, comfort, quality of workmanship and adherence to specifications.
- 2. Price.
- 3. Ability to deliver items within specified time.
- 4. Number of items the vendor is able to supply.

SECTION 7.0 – PURCHASE ORDER

A City of Aurora purchase order will be issued, indicating items for purchase to be made during contract period.

SECTION 8.0 – DELIVERY

All shipments are to be freight prepaid and shipped to the Aurora Fire Department, 75 N. Broadway, Aurora, IL 60505. Vendor to mark all packages as to their contents and list all items on the packing slip, including employee name.

Delivery is of considerable importance. Successful bidders shall agree to commence shipment of items as follows:

Items #1 and #2:

within six (6) weeks after receipt of order. (In emergency situations, defined by the Aurora Fire Department as contamination, excessive emergency-related damages, and recruit classes, the vendor shall agree to provide, at no extra cost, delivery within four (4) weeks.

Items #3 thru #4:

within two (2) weeks after receipt of order.

The City of Aurora reserves the right to sever the contract and request that the City Council award remainder of contract to the next lowest responsible bidder if these delivery schedules cannot be maintained.

<u>SECTION 9.0 – METHOD OF PAYMENT</u>

Payment will be made within forty-five (45) days of submission of approved invoice.

Invoices should emailed to Purchasing DL@aurora-il.org or mailed to:

City of Aurora Purchasing Division 44 E. Downer Place Aurora, IL 60507

DETAILED TECHNICAL SPECIFICATIONS FOR BID 18-63 STRUCTURAL FIREFIGHTER CLOTHING

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GENERAL PROVISIONS

PURPOSE AND SCOPE

This specification is intended to define the minimum requirements for bunker clothing for firefighters. In the absence of comment on particular points, industry standard practice should be presumed to prevail. Workmanship and material are to be first quality throughout. Any exceptions to specifications must be clearly spelled out at time of bid. In the absence of comment on a specific point, bidder will be required to furnish a <u>totally</u> compliant garment. Taking a blanket exception shall not be acceptable.

Does your bid comply with all aspects of this section? Yes No		
Comments:		
- 403		

CERTIFICATION & WARRANTY

The manufacturer of the protective clothing being bid must certify that the garments being offered meet or exceed all requirements of NFPA #1971 (the most current edition). Manufacturer must also list and label this product with Underwriter's Laboratories as the third party certification organization prescribed in NFPA #1971 (the most current edition). Certification shall include by definition the areas of limited protection resistance from blood borne pathogens as follows: Coat shall provide limited protection to the upper torso including the arms but excluding the head and neck interface area and the hand and wrist interface area. The pant shall provide limited protection resistance to the lower torso including the legs but excluding the foot and ankle interface area. The coat and pant overlap shall provide limited protection resistance to the coat/pant interface area. When utilized with the appropriate gloves, helmets, and boots; the coat with chinstrap unfolded and pant design shall also be capable of providing certified blood borne pathogen protection to the neck, wrist and ankle interface areas. MANUFACTURER must also include a written statement of lifetime warranty terms and conditions with the bid package. Manufacturer must provide upon request, third party certification of the required interface blood borne pathogen resistant capability.

his section? Yes No
_

LABELING REQUIREMENTS

Labels shall be permanently and integrally printed onto breathable materials that meet all the requirements for labels of NFPA Standards 1971 (the most current edition), in addition to the label (as provided in the garment) shall meet the NFPA vertical flammability tests. The garment shall be clearly labeled to fully identify the material content of every layer-outer shell, moisture barrier, and thermal liner.

Page 3

In addition, each separable layer of garment shall be labeled with the FEMSA (copyrighted) warning label in an obvious location.
FOR LIABILITY REASONS, ALL FABRICS AND CLOTHING MUST BE MANUFACTURED IN THE UNITED STATES OF AMERICA.
Does your bid comply with all aspects of this section? Yes No
CARE INSTRUCTIONS
Successful manufacturer to provide the FEMSA (copyrighted) Official User Information Guide. This material to be packaged with each garment along with a summary sheet describing garment specifications, sizing and production details. This written information is to be in complete compliance with all NFPA guidelines, and to reference same. Topics to include but not necessarily be limited to: User Cautions, Cleaning Instructions, doffing and donning instructions, maintenance criteria, repairs/customer changes, warranty information, size, fit and protective overlap requirements, safety considerations, storage conditions, decontamination considerations, retirement considerations, etc.
Does your bid comply with all aspects of this section? Yes No
TRACEABILITY PROGRAM
Successful bidding manufacturer to have in place a computer maintained traceability program that allows the assignment of a production control number to each garment and traceability from that production control number down to individual bolts of cloth used in all three layers of the garment composite construction. Production Control # to be recorded on garment label and on another protected area of garments.
Does your bid comply with all aspects of this section? Yes No
Comments:

PATENT CONSIDERATIONS

Seller agrees to defend Buyer at Seller's own expense, in all suits, actions or proceedings in which Buyer is made a defendant for actual or alleged infringement of any United States of America or foreign letters patent resulting from Buyer's use of the goods purchased as a result of this Invitation to Bid. Seller further agrees to pay and discharge any and all judgments or decrees, which may be rendered in any such suit, action or proceedings against Buyer.

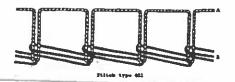
Seller agrees to indemnify and hold harmless the Buyer from any and all licenses, royalty and proprietary fees or costs, including legal costs which may arise out of Buyer's purchase and use of goods supplied by the seller.

It is expressly agreed by Seller that these covenants are irrevocable and perpetual.
Does your bid comply with all aspects of this section? Yes No
Comments:
FLAMMABILITY OF CONSTITUENT MATERIALS
Label, bindings, hang up loops and production labels shall be tested for flame resistance and shall comply with NFPA 1971 (the most current edition) vertical flammability testing.
Does your bid comply with all aspects of this section? Yes No
Comments:
SELF BINDING Liner and moisture barrier to be stitched together and turned then top stitched to create a self binding. The extra bulk of separate binding material is specifically disallowed.
Does your bid comply with all aspects of this section? Yes No Comments:
THREAD
All thread to be Nomex of minimum TEX 50 24/4 size. Lighter colored garments and trim areas to feature yellow colored thread while black garments feature black thread.
Does your bid comply with all aspects of this section? Yes No Comments:
Page 5 APPENDIX B

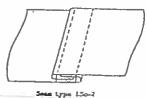
STITCH METHODS

Major A and B Seams:

All major A & B seams (as defined by NFPA Standard #1971/current edition) shall be doubled stitched, double feld throughout all three layers (outer shell, moisture barrier and thermal liner) with the specified Nomex thread. Detailed stitch and seam type requirements follow:



Stitch type 401 (i.e., double locked stitch) as defined by Fed. Std. No. 751a (diagram above also drawn from that source) to be used on all Major A & B seams (in all three garment layers)



Seam type Lsc-2, modified to ensure both stitch lines penetrate all layers of cloth at joining, as otherwise defined by Fed. Std. 751a (original diagram modified above, also drawn from that source) to be used on all Major A & B seams (in all three garment layers).

All moisture barrier seams shall be tape sealed to meet NFPA water penetration requirements.

Does your bid comply with all aspects of this section?

For Shell:
For Moisture Barrier

Yes _ Yes _ No ____

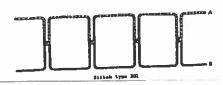
For Thermal Lining

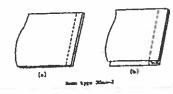
es_ Exceeds

Minor Seams

Comments:

Minor seams, such as collar, shields and mated hems, also to be stitched with the specified Nomex thread; detailed stitch and seam type follow:





Stitch type 301 (i.e., lock stitch) as defined by Fed. Std. No. 751a (diagram above also drawn from that source) to be used for all minor seams.

Seam type Ssae-2 (shown before and after required turning) shall be used for all Minor Seaming (diagram above drawn from Fed. Std. 751a).

Does your bid comply with all aspects of this section? Yes ____ No ____

Comments:

Pockets

Exterior garment pockets and garment labels shall be stitched per the detailed requirements outlined below: Stitch type 301 (i.e., lock stitch) as Seam type Lsd-2 (diagram above drawn defined by Fed. Std. No. 751a (diagram from Fed. Std. No. 751a) shall be used for above also drawn from that source) to all exterior pocketing. be used for all pockets. NOTE: Interior pocketing should feature same construction details but reinforced single stitch line (seam type Lsd-1) may be substituted. Does your bid comply with all aspects of this section? Yes No _____ Comments: 2xeeds Trim And Warning Labels Trim stitching shall be detailed below: Stitch type 301 (i.e., lock stitch) as Seam type Ssbd-1 (diagram above drawn defined by Fed. Std. No. 751a (diagram from Fed. Std. No. 751a) shall be used for above also drawn from that source) to all trim attachment. be used for all Trim.

Does your bid comply with all aspects of this section? Yes _____ No ____

Comments:

Single Layer Hemming & Finishing	
Stitch type Mi	
Stitch type 301 (i.e., lock stitch) as defined by Fed. Std. No. 751a (diagram above also drawn from that source) to be used for all single layer hemming and finishing.	Seam type Efb-1 (diagram above drawn from Fed. Std. No. 751a) shall be used for all single layer hemming or finishing.
Does your bid comply with all aspects of this se	ection? Yes No
Comments: Zycaels	
ength (in 1" increments) and pants waist (in 2" ange of woman's sizing (on woman's patterns) arge sizing and women's garments cut to me	increments) and inseam (in 1" increments) sizes. A for will also be available. Small, medium, large, and exen's patterning will not be considered acceptable sires.
Garments shall be available in custom coat clength (in 1" increments) and pants waist (in 2" ange of woman's sizing (on woman's patterns) arge sizing and women's garments cut to me	
Garments shall be available in custom coat clength (in 1" increments) and pants waist (in 2" ange of woman's sizing (on woman's patterns) arge sizing and women's garments cut to me proper fit facilitates mobility and minimizes stoversized or customer fitting, including sleeve leads to be something to be something to be something. Comments:	increments) and inseam (in 1" increments) sizes. A followill also be available. Small, medium, large, and exen's patterning will not be considered acceptable sintress. There shall be no additional charges allowed engths. Section? Yes No
Garments shall be available in custom coat clength (in 1" increments) and pants waist (in 2" ange of woman's sizing (on woman's patterns) arge sizing and women's garments cut to me proper fit facilitates mobility and minimizes stoversized or customer fitting, including sleeve leads to be something to be something to be something. Comments:	increments) and inseam (in 1" increments) sizes. A followill also be available. Small, medium, large, and exen's patterning will not be considered acceptable siress. There shall be no additional charges allowed engths. Section? Yes No

HIGH TEMPERATURE, NFPA CERTIFIED MATERIAL REINFORCEMENTS

Reinforcements to be provided at cuffs and pockets and shall meet the requirements of NFPA #1971/current edition. Standard placement will be utilized unless specified otherwise by purchaser (any special instructions are noted in custom option section of this specification). Purchaser has determined the type of reinforcement material for their own use and purposes. Therefore, alternate or substitute reinforcement materials other than those specified will not be considered.

Does your bid comply with all aspects of th Comments:	is section? Yes No No
APPLICABLE DOCUMENTS	
The following documents and edition in efficient specification to the extent specified herein.	fect on the date of invitation for bid shall form a part of this
STANDARDS:	
NFPA 1971/LATEST EDITION 29 CFR 1910.156	Firefighters Protective Apparel Occupational Safety and Standards:
	Fire Brigades
FED-STD-191-A FED-STD-311	Textile Test Methods Leather, Methods of Sampling and
FED-STD-751	Testing Stitches, Seams and Stitching
SPECIFICATIONS:	
MIL-B-286	Button, Tack and Tack Button
MIL-C-10750	Coat, Firemen's
MIL-C-43774	Cloth, Aramid, Plain or Rip-Stop Weave
MIL-F-10884	Fasteners, Snap
MIL-T-44100	Fastener Tapes, Hook and Pile, Synthetic
MIL-T-83193	Thread, Aramid, Spun
MIL-T-3091	Trousers, Firemen's
GRF-KKL-271	Leather, Cattlehide, Strap Vegetable Tanned
Does your bid comply with all aspects of this	s section? Yes No
Comments:	

REPAIRS/ALTERATION SUPPORT

Successful bidding manufacturer to provide, free of charge, reasonable quantities of NFPA certified thread, materials, etc., to allow the department to manage their ongoing maintenance efforts. Also, successful bidding manufacturer to have on-call at no charge, during normal business working hours, a liaison for the repair department to assist the Fire Department on a telephone consultation basis, on any maintenance/repair questions that arise. Additionally, successful bidding manufacturer will agree to expedite, on their cost only basis, any repairs required to be done at the manufacturers plant, rather than in department, over the life of the contract.

s your old compi	with all aspects of	or una secuon: 1	cs 140	_
Comments:				

<u>ITEM #1</u>

DESCRIPTION: COAT

To avoid liability and interface problems, it is the intent of the purchaser that coats and pants be procured from the same manufacturer and be manufactured in the U.S.A.

PATTERNING CONCEPT

Garments shall feature a tailored three piece body (one piece back) construction throughout the outer shell, moisture barrier and thermal liner. One piece garments (either all layers or some layers) will not be considered acceptable since they cannot be tailored to contours. Similarly, garments with seams in mid back will not be considered acceptable because of backbone irritation that can occur with SCBA use. To facilitate individual tailoring needs, the major A & B seams joining the one-piece back to the right and left front body panels (outer shell and all interior layers) shall be located at the most lateral position when the coat is laid flat for inspection.

Does your bid cor	nply with all aspects of this section? Yes No	
Comments:	Exceeds	

PATTERNING REQUIREMENT

To assure maximum freedom of movement and reduce kinetic resistance with minimum garment weight and bulk; coat patterning should include the following features:

- Degree of slope on shoulders to be no more than 20%.
- Hydraulic Butterfly sleeve patterning with 85 degree Lift Up Release Action shall be provided to minimize coat hem rise.
- Coat hem rise with overhead reach of both arms to not exceed 4" at maximal extension on properly fitted garments.
- Swivel Action Reversible sleeve attachment to minimize shoulder lift and allow full 360 degree freedom of movement.

•	Cuff shell/liner retraction shall not exceed ½" when both arms are raised overhead to eliminate wrist exposure.
•	10" chest over sizing shall be provided.
•	Reach (measured with coat laying flat on back and standard length sleeves extended to sides) to be provided as detailed below:
	Chart Siza Standard Deach

Chest Size	Standard Reach
40"	66"
42"	68"
44"	70"
46"	71"

 Coat sweep measurements must be consistent or slightly negative at the bottom.
Does your bid comply with all aspects of this section? Yes No
Comments: Skeeds
LINER ATTACHMENT
The completed liner/moisture barrier assembly shall attach by means of four (4) evenly spaced glove snaps to each outer shell front facing to reduce weight and bulk/stiffness. To provide continuous moisture/blood borne protection at the front, the liner shall be positioned so it is sandwiched between an outer facing breathable pathogen shield and inside facing. The use of zippers or Velcro in this area shall not be allowed due to their added weight, bulk and stiffness.
Liner sleeves shall be attached at the outer shell cuff by means of snaps and 2 sets of Nomex tabbing strips per cuff.
To provide continuous moisture/blood borne pathogen protection at the neck, the liner shall be positioned so it is sandwiched between an outer facing pathogen shield, and inside facing of the specified outer shell material folded over and both sewn in at the neck seam. Attachment shall be by means of four (4) glove snaps that penetrate ONLY the outside layer of the innermost facing, so that metal contact at the wearers' neckline is completely eliminated.
Does your bid comply with all aspects of this section? Yes No Comments:
LINER INSPECTION DEVICE
Garment shall feature an opening in attaching stitching between liner and moisture barrier which will close and open via hook and pile tape. The opening to allow total liner/moisture barrier inversion so that the moisture barrier film, seam sealing, and thermal liner fill can be fully and effectively inspected.
Does your bid comply with all aspects of this section? Yes No

COAT	LINER	LABEL
------	-------	-------

Shall be integrally printed on FR Cotton Indura and lock stitched to the inside right body panel in a fashion to provide an inside liner pocket.
Does your bid comply with all aspects of this section? Yes No
Comments: Exculs
COAT SHELL LABEL
Shall be integrally printed on FR Cotton Indura and lock stitched to the shell along one side of the label at the collar seam.
Does your bid comply with all aspects of this section? Yes No Comments:
COLLAR
Collar layered construction, consisting of a layer of a moisture/pathogen barrier material and another layer of NFPA approved insulating material, sandwiched between two layers of specified outer shell material and at least 3" high. The design shall incorporate in the patterning a natural contour that will allow proper fit and performance in the standing (upright) or stowed position. There shall be no vertical or horizontal seams or stitching in the body of the collar, since this may weaken collar integrity. Left outside of collar to have a sewn piece of 3"x5" Velcro hook to insure maximum adjustability when engaging chinstrap/collar closure. Does your bid comply with all aspects of this section? Yes No
Comments:
CHINSTRAP
Chinstrap layered construction identical to that of the collar configuration listed in the previous paragraphs. Chinstrap shall be 8" long across the top corners, 11" long across the bottom corners, and be of a longitudinally folding design so that when unfolded it offers a height of approximately 5" and while folded a 3- ¾" height, 4" vertical height measured at the center. The bottom edge shall incorporate extra material in the shape of a crescent to insure full interface closure of the collar, chinstrap and coat front closure/stormflap in order to pass the whole garment water tight integrity test. The leading underside edge of the chinstrap shall have a vertical strap of 1.5" Velcro pile to insure closure and passage of the whole garment water tight integrity test.
Does your bid comply with all aspects of this section? Yes No Comments: No
Water transfer to the second of the second o

HANG UP LOOP	
layers of the specified	hang up loop to the interior provided at collar. Loop to be constructed of triple outer shell material lock stitched to the coat. Webbing or substituting other than I material will not be considered acceptable because of lower relative strength
Does your bid comply	vith all aspects of this section? Yes No
Comments:	Excels

SLEEVES

Extra full cut one piece outer shell set in sleeves with built in bellows for maximum freedom. To reduce the chances of possible top seam failure in that high thermal exposure area the outershell sleeve's only Major A seam shall follow the underside of the arm and shall not cross over the outside of the elbow joint. Sleeve seam and sleeve attachment to coat body in all layers shall be 100% double feld and double stitched for maximum strength (i.e., a Major A seam requirement, as defined previously in this specification).

Does your bid comply with all aspects of this section? Yes No
Comments: Exculs
EXTERNAL WRISTLET
100% Nomex knit outer wristlet to be mounted to the end of the outer shell sleeve to prevent debris movement up the sleeve (between outer shell and moisture barrier/thermal liner assembly).
Does your bid comply with all aspects of this section? Yes No Comments: S

INNER WRISTLET & WATERWELL

100% Nomex knit inner wristlet protected by a flame and moisture resistant waterwell must be featured on every garment. Longer inner wristlet incorporating a Nomex webbing thumb attachment loop shall be sewn to the thermal liner sleeve end (not to the outer shell). A specified moisture barrier waterwell with an elastic gather shall be sewn to the moisture barrier sleeve end with all seams sealed to allow maximum channeling of water away from inside the moisture barrier/thermal liner sleeve end and pass the whole garment water tight integrity test. Thermal liner/wristlet shall be bar tacked and seam sealed at the junction of the moisture barrier sleeve to waterwell seam to prevent liner pull out. This inner waterwell assembly shall be interface capable with the appropriate glove to provide wrist protection during the liquid tight integrity test.

Does your bid comply with all aspects of this section? Yes No
Comments: Source
FRONT CLOSURE PROTECTIVE OVERLAP
Two inch wide panels of breathable moisture/pathogen barrier (film facing outward) and specified thermal liner material shall be provided at coat front closure facings to preclude any type of break in the protective envelope. The entire circumference of a closed coat will consist of specified shell, moisture barrier and thermal liner materials. The inside trailing edge of each 2" wide inner panel shall have the breathable moisture/pathogen material wrapped around the edge by ½" to create an anti-wick guard to prevent soak through during the required shower test. An additional layer of 6" wide breathable moisture/pathogen barrier material (film facing outward) shall be sewn between the 2" wide panels and outer shell coat body for the entire length of coat front in a fashion to prevent liquid entry during the whole garment water tight integrity test.
Decrease hid complex with all concerts of this particular Very No.
Does your bid comply with all aspects of this section? Yes No Comments:
Comments:
STORM SHIELD
Double thickness outer shell material exterior mounted storm shield to be provided. Closure must be either inner or outer Velcro and a protective closure (i.e., hooks & dees or zipper).
NOTE: When an external hook and dee closure is specified in custom features, the leading edge of the storm flap shall be internally reinforced with minimum 2" wide additional layer of NFPA certified material.
Does your bid comply with all aspects of this section? Yes No
Comments: Excercés

POCKETS

All exterior specified pockets and flaps are reinforced at all stress points with bartack stitching. A	All
pockets will be reinforced with an extra layer of NFPA certified outer shell, moisture barrier,	or
reinforcement material for extra durability. All pocket closures to be made with 1.5" minimum wid	lth
Velcro.	

Does your bid comply with all aspects of this section? Yes No
Comments: 2 kcm 05
DESIGN CONCEPT (Styling)
Tailed styling designed to allow 9" frontal and 15" rear overlap with traditional waist high pants.
<u>MATERIALS</u>
Coat to be constructed in the following multi-layer configuration:
OUTER SHELL: 7.5oz 40% Nomex, 60% Kevlar treated with shelltite for maximum water repellency. (color: black)
MOISTURE BARRIER: Crosstech 1.2 oz. Film on a 3.3 oz. Nomex Plainweave substrate
THERMAL LINER: 2-Layer Spunlace/Meta Aramid Facecloth (6.8 oz.). Blue in color and shall provide a minimum of 38.7 TPP's before washing, 48 TPP's after five washings.
Does your bid comply with all aspects of this section? Yes No Comments: Skell - Asma As - Gide - Coss kell Blk
Comments: Skeets - Asma Ar - Glide - Coiss kel
BIK
CUSTOM OPTIONS TO BE PROVIDED
Std- coat cuffs, PBO Millenia black, double stitched
Std-substitute positive closure articulating rapid rescue strap in new coat for articulating rapid rescue strap
Std- Foldover Comfort Chinstrap

Std-Inspection Port Liner

Std- Liner detachable

Std- Liner label pocket

Std- Nomex – Tabbed long wristlet

New York-2 trim - Lime Reflexite, double stitched

Back Patch - Advanced black as specified.

AURORA six -3" sewn letters - Lime Reflexite

LAST NAME of firefighter on tail of coat in 3" sewn letters - Lime Reflexite

3" coat collar available

Chicago closure – 7" Shield – 2" hook and pile ext. with hook and D interior.

Dead Air Panels Extended - coat

X-large Half Height Bellow Pockets lined with Kevlar, flap closure with three strips of double stitched Velcro

Radio Pocket – Advanced. 9" X 3" X 2", double stitched Velcro

- left chest
- Mic Tab Advanced, to match color.
- left collar topside / underside

Flashlight clip reverse clip on patch with Velcro strap

Bar coded label – permanent, breathable and meets NFPA fire resistive requirements

Any instructions in this custom option section that contradicts earlier specified statements supersede those earlier statements as long as the required certifications are not compromised.

All custom options to be attached to coat with lock stitching. Chain stitching will not be considered acceptable since it will unravel if even a single stitch is broken.

Does your bid comply	with all aspects of this section?	Yes_	No
Comments:	Executs		
			*

MANUFACTURER			ESTIMATED UNITS	Committee of the State of the S	ESTIMATED DELIVERY TIME
Globemetro	Clam	1245	50	62250	4 weeks . Rec leweeks - STE

OPTIONAL

1. Hand warmer Dirkal pockets

Comments: Flees-linel Hand warmer Plets

8"x 8"x 2"

MANUFACTURER	VENDOR PRODUCT #	A STATE OF THE STA	ESTIMATED UNITS	TOTAL PRICE INCL SHIPPING	ESTIMATED DELIVERY TIME
1. Globe	HW	75	50	3750	Above

ITEM #2

DESCRIPTION: PANTS

To avoid liability and interface problems, it is the intent of the purchaser that coats and pants be procured from the same manufacturer and manufactured in the U.S.A.

Pants to meet or exceed NFPA #1971, most recent edition

PATTERING CONCEPT

Garments shall feature a tailored four piece outer shell with two piece, moisture barrier and thermal liner.

Does your bid com	ply with all aspects of this section? Yes No	
Comments: _	Exacus	

PATTERNING REQUIREMENTS

To assure maximum freedom of movement and reduced kinetic resistance with minimum garment weight and bulk, the pants patterning shall incorporate:

- Hydraulic swivel action legs to torso interface
- An oversized diamond shaped crotch insert, graded according to size, for maximum action stride, optimum stepping reach and <u>no</u> "in crotch" seaming. To meet individual tailoring needs, and offer superior functionality, diamond shall extend from just above the left knee to just above the right knee and be centered equally from front to rear. Width of diamond at top of crotch shall be approximately 4", graded to size.
- Pants to rest in normal body line balance of 22" center to center distance at the cuff.

Comments:
Comments.
SUSPENDER BUTTONS
Eight heavy duty, rust resistant suspender buttons to be positioned around the waist. Suspender buttons shall be mounted through waist band of triple layer outer shell material that is internally reinforced with a 3/4" wide additional band of coated needlepunch Aramid.
Does your bid comply with all aspects of this section? Yes No Comments:
Comments.

LINER ATTACHMENT

Comments:	all aspects of this section? Yes No
LINER INSPECTION DEV	ICE .
close and open via hook and	pening in attaching stitching between liner and moisture barrier which we pile tape. The opening to allow total liner/moisture barrier inversion so the sealing, and thermal liner fill can be fully and effectively inspected.
Does your bid comply with a	all aspects of this section? Yes No
Comments:	all aspects of this section? Yes No
PANT LINER LABEL	
Shall be integrally printed or	FR cotton Indura and lock stitched to the inner left hip area in a fashion
-	
provide an inner pocket.	all aspects of this section? Yes No
provide an inner pocket.	all aspects of this section? Yes No
provide an inner pocket.	all aspects of this section? Yes No
provide an inner pocket. Does your bid comply with a Comments:	all aspects of this section? Yes No
provide an inner pocket.	all aspects of this section? Yes No
provide an inner pocket. Does your bid comply with a Comments: PANT SHELL LABEL Shall be integrally printed or	all aspects of this section? Yes No Exceeds In FR cotton Indura and lock stitched at the top at the inside right hip, below outside pocket flap to provide at right hip, trouser style pocket.
provide an inner pocket. Does your bid comply with a Comments: PANT SHELL LABEL Shall be integrally printed on a finished slash opening and Does your bid comply with a	n FR cotton Indura and lock stitched at the top at the inside right hip, belo

FLY FRONT

Outer shell fly shall be lock stitched to left side of front opening and be in proportion to waist size and crotch rise in both length and width. Fly inner lining shall extend at least 2" to the left of the outer shell fly attachment seam and shall be constructed of certified breathable (when breathable liners are specified) moisture barrier (film facing outward) and thermal liner. The right front pant opening shall have an internal facing extending at least 2" to the right and constructed of specified fabric. In combination with liner, the system shall offer 360 degrees protection without gaps during movement of outer shell moisture barrier and thermal liner. Closure shall be by means of minimum 1.5" Velcro and all construction techniques used shall provide liquid penetration protection under the whole garment watertight integrity test.

Comments: &keads
ESIGN CONCEPT (Styling)
ESIGN CONCERT (Stylling)
nt shall be of a traditional waist high only design to facilitate full torso ventilation of front, rear and les of trunk for maximum body cooling effect to help minimize firefighter heat stress. For this reason ner than waist high pants (bibs, semi-bibs, rear bibs, "enhanced waist", lumbar panels, etc.,) shall no considered acceptable or "as equal" since additional trunk wrapping traps heat and moisture creasing heat stress build up while also creating mechanical resistance when covering the natural tors axion point of the waist.
ces your bid comply with all aspects of this section? Yes No Comments:
<u>ATERIALS</u>
nts to be constructed in the following multi-layer configuration:
JTER SHELL: 7.5 oz 40% Nomex, 60% Kevlar trated with shelltite for maximum water repellency blor: black).
DISTURE BARRIER: Crosstech 1.5 oz. Film on a 3 oz. Nomex plainweave substrate.
IERMAL LINER: 2-Layer Spunlace/Meta-Aramid Facecloth (6.8 oz). Blue in color and shall provide ninimum of 38.7 TPP's before washing, 48 TPP's after five washings.
ces your bid comply with all aspects of this section? Yes No Comments: Expel Arms AP Glile Yell BW

CUSTOM OPTIONS TO BE PROVIDED:

Std-Inspection Port Liner

Std-Liner detachable

No Medical Records Pocket

Std-Narrow 1.5" Velcro Fly, double stitched over hook and dee fastener

Dead Air Panels - Pants

3" Cuff trim - Lime Reflexite, double stitched

Heat Channel Knees - PBO Millenia, Advanced, color black

Angled Cuffs - pants -PBO Millenia, Advanced, color black

Pants Cuffs -PBO Millenia, double stitched, Advanced, color black

Take up Straps 2 postman – Color black

X-Large Bellows pockets - pants Advanced, color black - lined with - Kevlar, three strips

double stitched Velcro

Sew Liner label on all sides

Bar coded label- permanent, breathable and meets NFPA fire resistive requirements

Dynafit Suspenders (8-Point) Installed

Any instructions in this custom option section that contradicts earlier specified statements supersede those earlier statements as long as the required certifications are not compromised.

All custom options to be attached to pants with lock stitching. Chain stitching will not be considered acceptable since it will unravel if even a single stitch is broken.

Does your bid cor	nply with all aspects of this section?	Yes_L	_	No	
Comments:	Execus				

MANUFACTURER	3.50 August construction of the	ST Newscort Language W. W.	UNITS 50	SHIPPING 48250	TIME 4 Wests . Recont 6 Wests . 802
	VENDOR	UNIT	ESTIMATED	TOTAL PRICE INCL	ESTIMATED DELIVERY

Optional
a) Globe Metro Pant - N/C
b) Caira Globe RSX Pant - N/C
quaprat
c) Series 1 Belt - #150

OPTIONAL:

1.	Prep for Spider Class II Internal Pants Opening (adopt harness to pants) for any that are requested at
	time of measurement.

Comments: Sx caels

1. Gloke	# Con. 3	295	50	SHIPPING 14750	See Apore
MANUFACTURER	PRODUCT	The second secon	UNITS	INCL	TIME
	VENDOR	UNIT	ESTIMATED	TOTAL PRICE	ESTIMATED DELIVERY

SPEC COMPLIANCE PERCENTAGE CALCULATIONS

Total Number Of Yes Answers Total Number Of No Answers

Total Answers

% Spec Compliance (Total Yes Answers ÷ Total Answers)

49 100%

ANY "NO" ANSWER REQUIRES A FULL WRITTEN EXPLANATION.

ALL YES/NO QUESTIONS NOT CHECKED WHERE PROVIDED WILL BE CONSIDERED A "NO" ANSWER.

ITEM #3

DESCRIPTION: GLOBE SHADOW 14" FIRE BOOT, PULL-ON

Boots must meet or exceed NFPA #1971 AND 1992, the most current edition

Comments: 100 7. Compliant

MANUFACTURER	VENDOR PRODUCT #	UNIT PRICE	ESTIMATED UNITS	TOTAL PRICE INCL SHIPPING	ESTIMATED DELIVERY TIME
Clops	Shadow	408	40 pr	16320	2 weeks

ITEM #4

DESCRIPTION: FIRE HELMET

Morning Pride Ben 2 Plus, low ride, with 4" high temperature face shield, combination quick release/postman slide chin strap, 3M brand lime trim, ratchet adjustment headband, Nomex earflaps, or evaluated equal

Outer shell - FYR/glass composite

Helmets must meet or exceed NFPA #1971, the most current edition

Color: black, red, or white

Comments: 100%. Compleme
Bulland USTM6 -

MANUFACTURER	VENDOR PRODUCT #	UNIT PRICE	ESTIMATED UNITS	TOTAL PRICE INCL SHIPPING	ESTIMATED DELIVERY TIME
BULLARIS	USTEM	225	25	5625	SWEERS

BID SUBMITTAL CHECKLIST 18-63

PROTECTIVE GEAR FOR THE AURORA FIRE DEPARTMENT

Each bid must be placed in an envelope, sealed, and clearly marked on the outside: "Bid Proposal for Protective Gear for the Aurora Fire Department." In order to be considered responsive, the bidder must submit all of the following items in their sealed envelope:

	Bid Bond or Cashier's Check
	Bid Proposal Form (Appendix G)
	Detailed Technical Specifications (Appendix B)
	Group Description/Pricing (Appendix F)
<u> </u>	Bidder's Certification (Page 1)
	Bidder's Tax Certification (Page 2)
	References (Appendix D)
	Contact Information (Appendix E)
	Agreement (Appendix H)
<u> </u>	Local Vendor Preference Application – If Applicable (Appendix I)

CITY OF AURORA INVITATION TO BID 18-63 PROTECTIVE GEAR FOR THE AURORA FIRE DEPARTMENT

REFERENCES

(Please Type) Organization	Wheaton Fine Department
Address	1 Fago Circle
City, State, Zip	Wheaton, Il 60189
Phone Number	630.260.2175
Contact Person	Pete Vassios
Date of Project	Ongoing
Organization	Hanover Pade Fire Department
Address	6850 Barrington Road
City, State, Zip	Hanovertack of 60133
Phone Number	630.823.5800
Contact Person	Craig Haigh
Date of Project	Ongoing
Organization	Westment Fire Department
Address	6051 S. Gss Ave.
City, State, Zip	Westmont, IC 60559
Phone Number	630.829.4480
Contact Person	Chris Gerlich
Date of Project	Ongoing

Bidder's Name:	Dinges Fine Company (Dinges Partners Group)
Signature & Date:	10-30.18

CITY OF AURORA INVITATION TO BID 18-63

PROTECTIVE GEAR FOR THE AURORA FIRE DEPARTMENT

CONTACT INFORMATION

Vendor shall	provide th	e following	contact information	assigned to	service the Ci	ty of Aurora account.
V Chaor Sharr	provide in		, comact miloimanon	assigned to	SOLATOR THE CI	iy or Autora account.

Customer Service/General Information: Ph: \$15-857-2000
Name: Nicholas C. D. nacs Ph: 815-851. 2000 Fax: \$15.857.3700 E-mail: Name: Odings Chings The. con
Billing & Invoicing question: Name: Laura Morgan Ph: 815.857. 2000 Fax: \$15.857.3700 E-mail: Imorgan & dings fire. con
Name: Jaine Schafer Ph: 815-857-2006 Fax: £15-857.3700 E-mail: jainel dinges fire. von
Bidder's Name: Dugs Fire Company (Oinges Pathers Gray) Signature & Date: 10.30.18

THIS FORM TO BE COMPLETED AND SUBMITTED WITH BID 18-63

FIRE DEPARTMENT PROTECTIVE GEAR	CTIVE GEAR		COMPAN	COMPANY NAME:		
ITEM	MANUFACTURER	VENDOR PRODUCT#	UNIT	ESTIMATED UNITS	TOTAL PRICE INCL. SHIPPING	ESTIMATED DELIVERY TIME
 Bunker Coat: Morning Pride "Tails", or evaluated equal 	Globe Metro	CLXM	1245	90	62,350	4 Weeks - Keen, b weeks - STY
 Bunker Pants: Morning Pride (compatible with "Tails" coat), or evaluated equal 	Globe IH Pauls	##	965	20	48250	4 weeks - Acm, b 6 weeks. STB
3. Fire Boots: Globe 14" structural fire boot, pull-on, or evaluated equal	Globe Shadon	Shakon	408	40 pr	16320	2 Willy
 Fire Helmet: Morning Pride Ben 2 Plus Traditional, or evaluated equal 	Bulland	USTMG	335	25	5625	2WEEKS

CITY OF AURORA BID PROPOSAL FORM 18-63

PROTECTIVE GEAR FOR AURORA FIRE DEPARTMENT

I/WE propose to furnish the work shown on the attached Specifications to Bid at the following delivered price. Vendors may choose to submit a bid on all items or on selected items only.

Sumn	nary of Page 1 Appendi	<u>x E</u>			<u>20</u>	19 TOTAL NE	Γ BID PRICE
1.	Bunker Coat: Mornin	g Pride "Tails",	or evaluate	ed equal	_	6225 482	50
2.	Bunker Pants: Morni with "Tails" coat), or	_ , _			_	482	50
3.	Fire Boots, Globe Sha	ndow 14" fire b	oot, pull-or	n, or evaluated	d _	1632	. 0
4.	Fire Helmet: Morning	g Pride Ben 2 P	lus Low Ri	de, or evaluate	ed _	562	5
Discount Percentage if Awarded All Items:%							
*These items must be compatible with protective gear identified in the technical specifications.							
Contract extension year, percentage mark-up per item, for:							
		2020	5	%			
2021%							
All shipments are to be freight prepaid and shipped to the Aurora Fire Department, 75 N. Broadway, Aurora, IL 60505. Vendor to mark all packages as to their contents and list all items on the packing slip, including employee name.							
Delivery is of considerable importance. Successful bidders shall agree to commence shipment of items as follows:							
Items #1 and #2: within six (6) weeks after receipt of order. (In emergency situations, defined by the Aurora Fire Department as contamination, excessive emergency-related damages, and recruit classes, the vendor shall agree to provide, at no extra cost, delivery within four (4) weeks. Items #3 and #4: within two (2) weeks after receipt of order.							
BID SUBMITTED BY							
COMPANY Dinges Fine Company							
				1			

Page 1

APPENDIX F

CITY OF AURORA BID PROPOSAL FORM 18-63 PROTECTIVE GEAR FOR AURORA FIRE DEPARTMENT

The City of Aurora reserves the right to sever the contract and request that the City Council award remainder of contract to the next lowest responsible bidder if these delivery schedules cannot be maintained.

No additional charges over total net bid price will be accepted without written approval of the Purchasing Director.

Do not add state, federal or local taxes. Municipalities are exempt. Exemption Certification Permit No. Illinois E9996-0842-07.

The City of Aurora reserves the right to reject any or all Bids, or parts thereof, and to waive any technicality, informality or irregularity in the Bids received, and to disregard all nonconforming or conditional Bids or counter-proposals and to hold the best Bids for ninety (90) days from the opening date set forth above. The City further reserves the right to award the Bid to the lowest responsible Bidder whose offer best responds in quality, fitness and capacity to the requirements of the proposed Work or usage and therefore is in the best interest of the City.

BID SUBMITTED BY
COMPANY dby Dinges Fire Company (Dinges Partners Comp
ADDRESS 243 E. Main
CITY, STATE, ZIP Amboy, Il 6/3/0
PREPARER'S NAME Nicholas C. Dingas
CONTACT PERSON Nicholas C. Dinges
EMAIL <u>Ndinges la dinges fire. Lom</u>
AUTHORIZED SIGNATURE CEO
PHONE #(8/5)857. 2000 FAX #(8/5)857. 3700 DATE 10/29/18

CITY OF AURORA AGREEMENT

THIS AGREEMENT, entered on this day of, 2018 ("Effective Date"), for Protective Gear f	or
the Aurora Fire Department is entered into between the CITY OF AURORA ("City"), a municip	
corporation, located at 44 E. Downer Place, Aurora, Illinois and Dwest Fire Company (DPG	<u>.)</u>
("Bidder"), located at 243 & Main Amboy, The 613/01.	

WHEREAS, the City issued an Invitation to Bid 18-63 Protective Gear for the Aurora Fire Department; and

WHEREAS, the Bidder submitted a Bid Proposal in response to the BID and represents that it is ready, willing and able to perform the Services specified in the BID and herein as well as any additional services agreed to and described in the Agreement; and

WHEREAS, ______, 2018, the City's awarded a contract to Bidder.

IN CONSIDERATION of the mutual promises and covenants herein contained, the parties hereto do mutually agree to the following:

1. Agreement Documents. The Agreement shall be deemed to include this document, Bidder's response to the BID, to the extent it is consistent with the terms of the BID, any other documents as agreed upon by the parties throughout the term of this Agreement, along with any exhibits, all of which are incorporated herein and made a part of this Agreement. In the event of a conflict between this Agreement and any exhibit, the provisions of this Agreement shall control.

Invitation to Bid 18-63

In connection with the BID and this Agreement, Bidder acknowledges that it has furnished and will continue to furnish various certifications, affidavits and other information and reports, which are incorporated herein. Bidder represents that such material and information furnished in connection with the BID and this Agreement is truthful and correct. Bidder shall promptly update such material and information to be complete and accurate, as needed, to reflect changes or events occurring after the Effective Date of this Agreement.

- **2.** Scope of Services. Bidder shall perform the Services listed in the Scope of Services, attached hereto as Exhibit 1.
- 3. <u>Term.</u> This agreement is for an initial one year term beginning January 1, 2019, and unless sooner terminated, ending December 31, 2019. This agreement has options for two 1-year extensions subject to mutual consent between the City of Aurora and Bidder.

4. Compensation.

a. Maximum Price. In accordance with the Contractor's Bid Proposal, the maximum price for providing the Services shall be in accordance to the pricing on the BID proposal form. The maximum price may not be changed unless the City is provided with supporting documentation to warrant the change in maximum price or as otherwise provided in this Agreement.

b. Schedule of Payment. The City shall pay the Contractor for the Services in accordance with the amounts set forth in Exhibit 2. The Contractor shall be required to submit an itemized invoice as well as any supporting documentation as required by the City. Payment shall be made upon the basis of the approved invoices and supporting documents. The City shall utilize its best efforts to make payment within forty-five (45) days after approval of the invoice. Each invoice shall be accompanied by a statement of the Contractor of the percentage of completion of the Services through the date of the invoice, where applicable.

5. <u>Performance of Services.</u>

Standard of Performance. Bidder shall perform all Services set forth in this Agreement, and any other agreed documents incorporated herein, with the degree, skill, care and diligence customarily required of a professional performing services of comparable scope, purpose and magnitude and in conformance with the applicable professional standards. Bidder shall, at all times, use its best efforts to assure timely and satisfactory rendering and completion of the Services. Bidder shall ensure that Bidder and all of its employees or subcontractors performing Services under this Agreement shall be: (i) qualified and competent in the applicable discipline or industry; (ii) appropriate licensed as required by law; (iii) strictly comply with all City of Aurora, State of Illinois, and applicable federal laws or regulations; (iv) strictly conform to the terms of this Agreement. Bidder shall, at all times until the completion of the Services, remain solely responsible for the professional and technical accuracy of all Services and deliverables furnished, whether such services are rendered by the Bidder or others on its behalf, including, without limitation, its subcontractors. No review, approval, acceptance, nor payment for any and all of the Services by the City shall relieve the Bidder from the responsibilities set forth herein.

Notwithstanding the foregoing, Bidder shall not be responsible for the performance of construction contracts, work or products, or any deficiencies or effects resulting therefrom, of any contractor, subcontractor, manufacturer, supplier, fabricator, or consultant retained by the City or any other third-party, including any person working on their behalf. Nothing herein shall be construed as giving the Bidder the responsibility for or the authority to control, direct, or supervise construction, construction means, methods, techniques, sequences, procedures, and safety measures and programs except those which directly relate solely to Bidder's performance of Services as set forth in this Agreement.

6. <u>Termination</u>.

Termination for Convenience. The City has the right to terminate this Agreement, in whole or in part, for any reason or if sufficient funds have not been appropriated to cover the estimated requirement of the Services not yet performed, by providing Bidder with thirty (30) days notice specifying the termination date. On the date specified, this Agreement will end. If this Agreement is terminated by the City, as provided herein, the City shall pay the Bidder only for services performed up the date of termination. After the termination date, Bidder has no further contractual claim against the City based upon this Agreement and any payment so made to the Bidder upon termination shall be in full satisfaction for Services rendered. Bidder shall deliver to the City all finished and unfinished documents, studies and reports and shall become the property of the City.

7. Miscellaneous Provisions.

- a. Illinois Freedom of Information Act. The Bidder acknowledges the requirements of the Illinois Freedom of Information Act (FOIA) and agrees to comply with all requests made by the City of Aurora for public records (as that term is defined by Section 2(c) of FOIA in the undersigned's possession and to provide the requested public records to the City of Aurora within two (2) business days of the request being made by the City of Aurora. The undersigned agrees to indemnify and hold harmless the City of Aurora from all claims, costs, penalty, losses and injuries (including but not limited to, attorney's fees, other professional fees, court costs and/or arbitration or other dispute resolution costs) arising out of or relating to its failure to provide the public records to the City of Aurora under this agreement.
- b. Entire Agreement. This Agreement, along with the documents set forth in Section 1 and incorporated by reference elsewhere in this Agreement, with consent of the parties, represents the entire agreement between the parties with respect to the performance of the Services. No other contracts, representations, warranties or statements, written or verbal, are binding on the parties. This Agreement may only be amended as provided herein.
- c. Consents and Approvals. The parties represent and warrant to each other that each has obtained all the requisite consents and approvals, whether required by internal operating procedures or otherwise, for entering into this Agreement and the undertakings contemplated herein.
- d. Counterparts. This Agreement may be executed in one or more counterparts, each of which shall be an original, but all of which shall constitute one and the same instrument.

	FOR CITY OF AURORA By:
ATTEST:	Бу
City Clerk	FOR
	By
(SEAL)	(CORPORATE SEAL)

(If a Corporation)	CORPORATE NAME	Dings Fire Company	(DP6)
(SEAL)	S	2	
	Ву <u></u>	President – Contractor	
ATTEST:			
Secretary Secretary	y		
(If a Co-Partnership)			
		Partners doing Business und	der the firm
		Contractor	
(If an Individual)			(SEAL)
	Co	ntractor	(SEAL)

APPENDIX I

LOCAL PREFERENCE APPLICATION





City of Aurora, IL - Local Vendor Preference Application

The business identified below is requesting to be placed on the City of Aurora, Illinois Local Vendor Preference list, in accordance with ordinance O18-070, approved August 28, 2018.

	1)	Date Submitted:
	2)	Name of Business:
	3)	Address of Local Office:
	4)	City, State, Zip:
	5)	Company's Web Address:
	6)	Phone: Fax:
	7)	County your Local Business is Located In:
		Submitted By (Signature):
		Print Name and Title:
		Email Address:
	Sec	2. 2-410Prequalification; local bidder.
(a)	pre Cit a.	n interested business would like to prequalify as a "local business", such a business shall complete and submit the qualification application along with supporting documentation, as listed below, and the applicable fee as set by the y Council, to the Finance Department: Evidence that the business has established and maintained a physical presence in the City of Aurora, by virtue of the ownership or lease of all or a portion of a building for a period of not less than twelve (12) consecutive months prior to the submission of the prequalification application; and Evidence demonstrating that the business is legally authorized to conduct business within the State of Illinois and the City of Aurora, and has a business registered to operate in the City if required; and Evidence that the business is not a debtor to the City of Aurora. For purposes of this subparagraph, a debtor is defined as having outstanding fees, water bills, sales tax or_restaurant/bar tax payments that are thirty (30) days or more past due, or has outstanding weed or nuisance abatements or liens, has failure to comply tickets or parking tickets that are not in dispute as to their validity and are not being challenged in court or other administrative processes.
	Ple	ck up documentation for (a) a. and (a) b. must accompany this submittal or application will be rejected. ase note for (a) c. above the City of Aurora will verify internally that your company does not have any standing fees. Your company should make sure that to the best of its knowledge all bills are current.
	Cit	turn completed application, with all required backup documentation to: y of Aurora, Attn: Purchasing Division, 44 E. Downer Place, Aurora, IL 60507 email to: <u>PurchasingDL@Aurora-il.org</u>
(a) (a) (a)	a. b.	not write below this line: For City of Aurora use ONLY
	Dat	e:
	Ap _j Let	proved: Denied: ter Sent: Initials:



City of Aurora

Purchasing Division • Finance Department • 44 E. Downer Place • Aurora, Illinois 60507-2067 (630) 256-3550 • FAX (630) 256-3559

Jolene Coulter Director of Purchasing

DATE:

October 25, 2018

TO:

Prospective Bidders

FROM:

Jolene Coulter, Director of Purchasing

RE:

CITY OF AURORA INVITATION TO BID 18-63

Protective Gear for the Aurora Fire Department

This notice forms a part of the Invitation to Bid 18-63: Protective Gear for the Aurora Fire Department. All other information pertaining to this Invitation to Bid shall remain the same.

<u>Please submit an original response and three (3) complete paper</u> copies of your sealed bid proposal. Each shall have provided all requested information, and submitted all appropriate forms, certificates, affidavits and addendum acknowledgements in each copy in order to be considered responsive.

Bid Proposals will be accepted until 2:00 pm, Wednesday, October 31, 2018 at the Office of the City Clerk, 44 E. Downer Place, Aurora, IL 60507.

Please acknowledge this addendum with your bid proposal. Failure to do so may subject Bidder to disqualification.

Responses to questions received by 8:00 am, Tuesday, October 23, 2018:

1) Do you have the contract number of the last awarded bid and where to find that information, or could you please furnish the results?

This was previously bid in 2015, bid number 15-52. Bid tabulations for the previous bids can be found on the city's website, https://www.aurora-il.org/1559/2015-Tabulations.

2) Could you tell me who else you sent these bids out to?

We do not maintain plan holder lists.

3) Do you have a local preferred vendor in Aurora currently?

We do not have a "preferred" vendor in Aurora. The city encourages any vendor to provide a competitive bid.

- 4) The current brand name specification for the coat and pants, have or are soon-to-be phased out of availability, such as the outer shell material: 40% Nomex and 60% Kevlar.
 - Section 3.0, Page 2, Appendix A allows for vendors to bid an alternative product to those specified. Please follow the instructions if you would like to bid on an alternative product.
 - In Appendix B, the vendor is to state if the proposed bid meets all aspects of this section, and if they exceed please state as such.
- 5) Regarding the Fire Helmet, page 22, Appendix B. Will Bullard with Cairns 880 be accepted as an approved equal?

Yes, the city will accept Bullard with Cairns 880 as an accepted equal.

End of Addendum

GENERAL SPECIFICATIONS PROTECTIVE JACKET FOR STRUCTURAL FIRE FIGHTING

October 10, 2018 Aurora FD

SCOPE

This specification details design and materials criteria to afford protection to the upper and lower body, excluding head, hands, feet, against adverse environmental effects during structural fire fighting. All materials and construction will meet or exceed NFPA Standard #1971 and OSHA for structural fire fighters protective clothing. Comply Exception
OUTER SHELL MATERIAL - JACKETS
The "ARMOR AP" outer shell shall be manufactured by Safety Components and constructed of 67/33 Para-Aramid/Meta-Aramid with a comfort twill weave, having an approximate weight of 6.5 oz per square yard. The shell material must be treated with a durable water-repellent finish and the color of the garments shall be black.
ComplyException
(Optional) OUTER SHELL MATERIAL JACKETS

The outer shell shall be constructed of TENCATE "BRIGADE™ 750" (Nomex®) plain weave with an approximate weight of 7.5 oz. per square yard, shall be treated with ShelltiteTM water repellent finish. Color of the garments shall be natural (off white).

THERMAL INSULATING LINER - JACKET

The thermal liner shall be constructed of 7.4 oz. per square yard Safety Components GLIDE™ ICE 2L-E89; one layer of 1.5 oz. and one layer of 2.3 oz. per square yard E-89™ spunlaced Nomex®/Kevlar® aramid blend, quilt stitched to a 60% Nomex® Filament/40% Nomex®/Lenzing spun yarn Face Cloth. An approximate 8 inch by 10 ½ inch pocket, constructed of thermal liner overedged to a layer of moisture barrier material, shall be affixed to the inside of the jacket thermal liner on the left side by means of a single needle stitch. The thermal liner shall be attached to the moisture barrier and bound together by bias-cut Neoprene coated cotton/polyester around the perimeter. This provides superior abrasion resistance to the less expensive, less durable "stitch and turn" method. Further mention of "Thermal Liner" in this specification shall refer to this section.

t /	
Comply	Exception

MOISTURE BARRIER - JACKETS

The moisture barrier material shall be W.L. GORE CROSSTECH® black moisture barrier - Type 2F, which is comprised of a CROSSTECH® membrane laminated to a 3.3 ounce per square yard

Nomex® IIIA woven pajama check substrate. The CROSSTECH® membrane is an enhanced bicomponent membrane comprised of an expanded PTFE (polytetrafluoroethylene, for example Teflon®) matrix having a continuous hydrophilic (i.e. water-loving) and oleophobic (i.e. oil-hating) coating that is impregnated into the matrix. CROSSTECH® moisture barrier seams shall be sealed with GORE-SEAM® tape using a Series 6000 (or higher) GORE-SEAM™ sealing machine to afford comparable bacteriophage penetration resistance performance. Further mention of "Specified Moisture Barrier" in this specification shall refer to this section.

____Comply ____Exception

Exception

SEALED MOISTURE BARRIER SEAMS

All moisture barrier seams shall be sealed with a minimum 1 inch wide sealing tape. One side of the tape shall be coated with a heat activated glue adhesive. The adhesive side of the tape shall be oriented toward the moisture barrier seam. The adhesive shall be activated by heat and the sealing tape shall be applied to the moisture barrier seams by means of pressure exerted by rollers for that purpose.

METHOD OF THERMAL LINER/MOISTURE BARRIER ATTACHMENT FOR JACKETS

One strip of 5/8 inch wide FR hook and loop fastener tape shall secure the moisture barrier system to the shell. In addition, a minimum of 6 snap fasteners shall secure the thermal liner/moisture barrier to the outer shell along the length of the neck line under the top most collar (see Collar section). The top most collar shall be turned under and finished such that the snaps on the collar will not be able to contact the wearers skin. Snaps shall be protected from exterior heat by moisture barrier fabric. The remainder of the thermal liner/moisture barrier shall be secured with snap fasteners appropriately spaced on each jacket facing and snap fasteners at each sleeve end.

The thermal liner and moisture barrier shall be completely removable from the pant shell. Nine snap fasteners shall be spaced along the waistband to secure the thermal liner to the shell. The legs of the thermal liner/moisture barrier shall be secured to the shell by means of Ara-Shield® snap fasteners, 2 per leg. The Ara-shield® snap tabs shall be color coded to a corresponding color coded snap tab in the liner for ease of matching the liner system to the outer shell after inspection or cleaning is completed.

____Comply ____Exception

THERMAL PROTECTIVE PERFORMANCE

The assembled garment, consisting of an outer shell, moisture barrier, and thermal liner, shall exhibit a TPP (Thermal Protective Performance) rating of not less than 35.

____Comply ____Exception

STITCHING

The outer shell shall be assembled using stitch type #301, #401, #514 and #516. The thermal liners and moisture barriers shall be assembled using stitch type #301, #401, #504, #514, and #516. Major A outer shell structural seams, major B structural liner seams and shall have a minimum of 8 to 10 stitches per inch. All Major A seams shall be sewn with ball point needles only. All seams shall be continuously stitched only.

____Comply ____Exception

JACKET CONSTRUCTION

BODY

The body of the shell and AXTION® liner system shall be constructed of three separate panels consisting of two front panels and one back panel. The body panels shall be shaped so as to provide a tailored fit thereby enhancing body movement and shall be joined together by double stitching with Nomex® thread.

The hem of the jacket and liner system shall be constructed with EXTENDED BACK (EB) panels incorporating all 3-layers of the system. The outer shell EB shall be constructed of two layers of specified outer shell material, double stitched to the hem. The liner EB shall be constructed with one layer each of specified thermal liner and moisture barrier materials, serge stitched to the liner hem. There shall be two Ara-Shield® snap tabs sewn to the bottom of the shell portion of the EB which shall attach to corresponding snaps on the liner portion of the EB. The EB shall extend approximately 6 inches lower in the back than the front of the jacket providing and maintaining proper overlap when bending or crawling.

There shall be 2" lime/yellow Scotchlite™ Triple trim installed along the bottom of the EB allowing room for lettering above the trim at the top of the EB.

____Comply ____Exception

LOGOS

The garment brand shall be identified by means of red FR Nomex thread embroidery on the top of the left collar denoting "GLOBE" as the manufacturer. There shall be a reflective label specific to the garment style, measuring 1 inch wide by 4 inches long, installed on the left pocket flap.

____Comply ____Exception

DRAG RESCUE DEVICE (DRD)

A Firefighter Drag Rescue Device (DRD) shall be installed in each jacket. The ends of a 1 inch wide strap, constructed of Kevlar®, shall be sewn together to form a continuous loop. The strap shall be installed in the jacket between the liner system and outer shell such that when properly installed will loop around each arm. The strap will be accessed through a portal between the shoulders on the upper back where it is secured in place by an FR strap. The DRD shall be removable for laundering. The access port shall be covered by an outside flap of shell material, designed to fit between the shoulder straps of an SCBA. The flap will have a NFPA-compliant 3M Scotchlite™ reflective logo patch sewn to the outside to clearly identify the feature as the DRD (Drag Rescue Device). The DRD shall not extend beyond the outside flap. This device provides a quickly deployed means of rescuing a downed firefighter. Flimsy, rope-style DRD straps will not be considered.

____Comply ____Exception

LINER ACCESS OPENING - JACKET

The thermal liner and moisture barrier shall be completely removable from the jacket shell. oNE strips of % inch wide FR hook and loop fastener tape shall secure the thermal liner/moisture barrier to the outer shell along the length of the neckline under the collar. A minimum of 6 snap fasteners, to minimize gaps, shall secure the thermal liner/moisture barrier to the outer shell along the length of

the neckline under the collar. This opening shall run the full length of the collar for the purpose of inspecting the inner surfaces of the jacket liner system. The remainder of the thermal liner/moisture barrier shall be secured with a minimum of four snap fasteners appropriately spaced on each jacket facing and four Ara-Shield® snap fasteners at each sleeve end. The outside perimeter of the AXTION® liner moisture barrier and thermal liner layers shall be bound together along the side and bottom edges with a bias-cut Neoprene coated cotton/polyester binding for a finished appearance that prevents fraying and wicking of contaminants. Stitching used to secure the thermal liner and moisture barrier in place of the Neoprene shall not be considered since stitching is not able to provide the same level of abrasion resistance.

____Comply ____Exception

SIZING

The standard coat design shall be 6 inches longer at the rear hem than at the front hem and provide continuous and unbroken moisture barrier and thermal liner protection from the collar seam to the hem at the bottom of the jacket MEB. Each jacket length shall be determined by each individual's torso length to provide the jacket to pant interface as defined by NFPA 1500. Jacket design must interface properly with standard waist high turnout pants. To facilitate various body types the front jacket lengths shall be provided in the following lengths: 29 inches long (standard)

The jacket shall be available in even size chest measurements of two-inch increments, and shall range from a small size of 30 to a large size of 68. Generalized sizing, such as small, medium, large, etc., will not be considered acceptable. Sizing specifically for women shall also be available.

___Comply ____Exception

RETROREFLECTIVE FLUORESCENT TRIM

The retroreflective fluorescent trim shall be lime/yellow 3M Scotchlite™Triple Trim (L/Y borders with silver center). Each jacket shall have an adequate amount of retroreflective fluorescent trim affixed to the outside of the outer shell to meet the requirements of NFPA #1971 and OSHA.

The trim shall be in the following widths and shall be NYC style; 3 inch wide stripes - around the bottom of the jacket within approximately 1 inch of the hem, around the back and chest area approximately 3 inches below the armpit, around each sleeve below the elbow, around each sleeve above the elbow.

____Exception

REINFORCED TRIM STITCHING

All reflective trim is secured to the outer shell with Nomex® thread, using a locking chainstitch protected by our exclusive TrimTrax® system. Developed exclusively by Globe Manufacturing Co., LLC. this strip of 3/32-inch strong, durable, flame resistant black Kevlar® cording provides a bed for the stitching along each edge of the retroreflective fluorescent trim surface and affords extra protection for the thread from abrasion. TrimTrax® has been proven to be 5 to 7 times more durable than single or even double rows of stitching, significantly reducing maintenance costs and providing more value and a longer service life. Two rows of stitching used to attach the trim in place of the TrimTrax® shall be considered an unacceptable alternative, since it has been proven that the two

rows of stitching has insignificant impact on wear life. All trim ends shall be securely sewn into a seam for a clean finished appearance.

____Comply ____Exception

SEWN ON RETROREFLECTIVE LETTERING

Each jacket shall have 3" lime/yellow 3M Scotchlite™ lettering on Row B reading: AURORA

Each jacket shall have optional 2" or 3" lime/yellow 3M Scotchlite™ lettering for Fire Fighter names, location to be advised.

COLLAR & FREE HANGING THROAT TAB

The collar shall consist of a minimum four-layer construction and be of one-piece design. There shall be two layers of specified moisture barrier material sandwiched in between (see Moisture Barrier section) two layers of outer shell fabric.. The forward inside ply of moisture barrier shall be sewn to the inside of the collar at the edges only. The multi layered configuration shall provide protection from water and other hazardous elements, while maintaining thermal protection. The collar shall be a minimum of 3 inches high and graded to size. The leading edges of the collar shall extend up evenly from the leading edges of the jacket front body panels so that no gap occurs at the throat area. The collar's back layers of outershell and moisture barrier shall be joined to the body panels with a minimum of two rows of stitching. Inside the collar, above the rear seam where the collar moisture barrier is joined to the shell, there shall be a full strip of \% inch wide FR hppk fastener tape running the full length of the collar on the moisture barrier, and a corresponding piece of % inch wide FR loop fastener tape running the full length of the collar on the outer shell. The collar 's inside outershell and moisture barrier layer shall have 6 snap fasteners (minimum) spaced equidistant, to minimize gaps on lower edge of the collar. There shall be a series of corresponding snap fasteners on the thermal liner to engage the snaps on the collar, thus enclosing the liner access opening under the shell collar. These snaps shall be installed such that they do not penetrate from the outer shell through to the inner layers. The top of the thermal liner and moisture barrier shall be sandwiched between the underside of the top collar shell fabric and moisture barrier material, and the bottom collar shell fabric and moisture barrier material so as to reduce the possibility of liner detachment while donning and doffing.

A self material fabric hanger loop shall be sewn at the top of collar.

The throat tab shall be a minimum of 4 layers, of scoop type design and constructed of two plies of outer shell material with two center plies of moisture barrier material. The throat tab shall measure not less than 3½ inches wide at the center tapering to 1½ inches at each end with a total length of approximately 8½ inches. The throat tab shall be attached to the right side of the collar by a 1 inch wide by 1½ inch long piece of Nomex® twill webbing. The throat tab shall be secured in the closed and stowed position with FR hook and loop fastener tape. The FR hook and loop fastener tape shall be oriented to prevent exposure to the environment when the throat tab is in the closed position. A 1½ inch by 3 inch piece of FR loop fastener tape shall be sewn horizontally to the inside leading end of the throat tab and a 1 inch by 3 inch piece of FR hook fastener tape shall be sewn horizontally towards the opposite end of the throat tab. A corresponding piece of FR hook fastener tape measuring 1½ inches by 3 inches shall be sewn horizontally to the leading outside edge of the collar on the left side, for attachment and adjustment when in the closed position and wearing a breathing

apparatus mask.	The collar closure strap shall fold in half for storage with the FR loop fastener tape
engaging the FR	hook fastener tape.

_____Exception

JACKET FRONT

The jacket shall incorporate separate facings to ensure there is no interruption in thermal or moisture protection in the front closure area. The facings shall measure approximately $2\frac{1}{2}$ inches wide, extend from collar to hem, and be double stitched to the underside of the outer shell at the leading edges of the front body panels. A breathable moisture barrier material shall be sewn to the jacket facings and configured such that it is sandwiched between the jacket facing and the inside of the respective body panel. The breathable film side shall face inward to protect it. There shall be wicking barrier constructed of Crosstech 2F moisture barrier material installed on the front closure system on the left and right side directly below the front facings to ensure continuous protection and overlap. The wicking barrier shall extend no more than a maximum of $\frac{3}{4}$ inch beyond the inner facing and false facing shall be unacceptable. The thermal liner and moisture barrier assembly shall be attached to the jacket facings by means of snap fasteners.

____Comply ____Exception

STORM FLAP

A rectangular storm flap measuring approximately 3 inches (6 inches for hook and dee inside/FR hook and loop fastener tape outside closure; aka #7C) wide and a minimum of 23 inches long (based on a 32" jacket) shall be centered over the left and right body panels to ensure there is no interruption in thermal or moisture protection in the front of the jacket. The outside storm flap shall be constructed of two plies of outer shell material with a center ply of breathable moisture barrier material. The outside storm flap shall be double stitched to the right side body panel and shall be reinforced at the top and bottom with-backtacks.

____Comply ____Exception

STORM FLAP AND JACKET FRONT CLOSURE SYSTEM

The jacket shall be closed by means of (requires 6 inch wide storm flap) four non-ferrous inward facing hook and dee rings plus FR hook and loop fastener tape on the storm flap. The inner closure hook and dee rings shall be riveted to the leading edges of the left and right jacket body panels. The inward facing hooks shall be installed on the right front body panel and the dee rings shall be installed on the left front body panel. The storm flap shall close over the left and right jacket body panels and shall be secured with flame resistant hook and loop fastener tape. A 1½ inch by 23 inch piece of FR loop fastener tape shall be sewn with four rows of stitching along the leading edge of the storm flap on the underside. A corresponding 1½ inch by 23 inch piece of FR hook fastener tape shall be sewn with four rows of stitching to the left front body panel and positioned to engage the loop fastener tape when the storm flap is closed over the front of the jacket.

____Comply ____Exception

HALF HIGH EXPANSION (BELLOWS) POCKETS

Each jacket front body panel shall have a 2 inch deep by 10 inch wide by 6 inch high expansion pocket, double stitched to it and shall be located such that the bottom of the pockets are at the bottom of the jacket for full functionality when used with an SCBA. Retroreflective trim shall run over the bottom of the pockets so as not to interrupt the trim stripe. Two rust resistant metal drain eyelets shall be installed in the bottom of each expansion pocket to facilitate drainage of water. The pocket

flaps shall be rectangular in shape, constructed of two layers of outer shell material and shall measure 3 inches deeper than the pocket expansion and ½ inch wider than the pocket. The upper pocket corners shall be reinforced with proven backtacks and pocket flaps shall be reinforced with backtacks. The pocket flaps shall be closed by means of FR hook and loop fastener tape. Two pieces of 1½ inch by 3 inch FR hook fastener tape shall be installed vertically on the inside of each pocket flap (one piece on each end). Two corresponding pieces of 1½ inch by 3 inch FR loop fastener tape shall be installed horizontally on the outside of each pocket near the top (one piece on each end) and positioned to engage the hook fastener tape.

The half high expansion pockets shall be lined with a full Kevlar® twill material pouch to include the front, back, bottom and up the sides.

Comply ____Exception

(Optional) CARGO/HANDWARMER EXPANSION (BELLOWS) POCKETS

Each jacket front body panel shall have a 2 inch deep by 8 inch wide by 8 inch high expansion pocket, double stitched to it and shall be located such that the bottom of the pockets are at the bottom of the jacket for full functionality when used with an SCBA. Retroreflective trim shall run over the bottom of the pockets so as not to interrupt the trim stripe. Two rust resistant metal drain eyelets shall be installed in the bottom of each expansion pocket to facilitate drainage of water. The expansion pocket shall be reinforced with a layer of Kevlar® approximately 5 inches up on the inside of the pocket. The pocket flaps shall be rectangular in shape, constructed of two layers of outer shell material and shall measure approximately 3 inches deeper than the pocket expansion and ½ inch wider than the pocket. The upper pocket corners shall be reinforced with proven backtacks and pocket flaps shall be reinforced with backtacks. The pocket flaps shall be closed by means of FR hook and loop fastener tape. Two pieces of 1 ½ inch by 3 inch FR hook fastener tape shall be installed vertically on the inside of each pocket flap (one piece on each end). Two corresponding pieces of 1 ½ inch by 3 inch FR loop fastener tape shall be installed horizontally on the outside of each pocket near the top (one piece on each end) and positioned to engage the hook fastener tape.

Additionally, a separate hand warmer pocket compartment will be provided <u>under</u> the expandable cargo pocket. This compartment will be accessed from the rear of the pocket and shall be lined with Nomex® Fleece for warmth and comfort. Shell material linings shall not be considered acceptable.

(32" or shorter length) Retroreflective trim shall run over the bottom of the pockets so as not to interrupt the trim stripe.

____Exception

SLEEVES

The sleeves shall be of two-panel construction, contoured, drop shoulder design. The outer and under sleeve panels shall be double stitched together with Nomex® thread. The sleeves shall be contoured (curved) to follow the natural shape of the human arm unlike straight, tubular sleeve configurations. The drop shoulder design, along with the contoured sleeves shall provide for a high degree of uninhibited arm and shoulder movement. The same contoured, drop shoulder design shall be used in all layers of the garment (shell, moisture barrier, and thermal liner).

____Comply ____Exception

SLEEVE CUFF REINFORCEMENTS

The sleeve cuffs shall be reinforced with an extra layer of outer shell material.

The cuff reinforcements shall not be less than 2 inch in width and folded in half, approximately one half inside and one half outside the sleeve end for greater strength and abrasion resistance. The cuff reinforcement shall be double stitched to the sleeve end; a single row of stitching shall be considered unacceptable. This independent cuff provides an additional layer of protection as compared to a turned and stitched cuff. Jackets finished with a turned and stitched cuff do not provide the same level of abrasion resistance and will be considered unacceptable.

_____Exception

WRISTLETS / SLEEVE WELLS

Each jacket shall be equipped with Nomex® knit wristlets with thumb loop not less than 4 inches in length and of double thickness. A loop of ½ inch wide black 6.0 oz. Brigade material shall be installed on each wristlet. This loop is designed to slip over the thumb and hold the wristlets from riding up the arm. The color of the wristlets shall be grey.

The wristlets shall be sewn to flame resistant neoprene coated cotton/polyester material, which in turn shall be sewn to the inside of the sleeve shell approximately five inches from the sleeve cuff. This sleeve well configuration serves to prevent water and other hazardous elements from entering the sleeves when the arms are raised. The neoprene material shall also line the inside of the sleeve shell from the cuff to a point approximately five inches up, where it joins the sleeve well and is double stitched to the shell. Four Ara-shield® snap tabs will be sewn into the juncture of the sleeve well and wristlet. The tabs will be spaced equidistant from each other and shall be fitted with female snap fasteners to accommodate corresponding male snaps in the liner sleeves. One of the Ara-shield® snap tabs shall be a different color in the liner to correspond with color coded snap tabs for ease of matching the liner system to the outer shell after inspection or cleaning is completed. This configuration will ensure there is no interruption in protection between the sleeve liner and wristlet.

_____Exception

LINER SHOULDER THERMAL ENHANCEMENT

A minimum of one additional layer of thermal liner material shall be used to increase thermal insulation in the shoulder area of the liner system. This thermal enhancement layer shall drape over the top of each shoulder extending from the collar to the sleeve/shoulder seam, down the front a minimum 2 inches from the juncture of the collar down the back to a depth of a minimum of 2 inches to provide greater CCHR protection in this high compression area. The thermal enhancement layer shall have finished edges by means of overedging. Raw or unfinished edges shall be considered unacceptable. Thermal scraps shall not be substituted for full-cut fabric padding. Smaller CCHR reinforcements shall not be considered acceptable since they provide far less area of coverage.

____Comply ____Exception

RADIO POCKET

Each jacket shall have a pocket designed for the storage of a portable radio. This pocket shall be of box type construction, double stitched to the jacket and shall have one drainage eyelet in the bottom of the pocket. The pocket flap shall be constructed of two layers of outer shell material measuring approximately 3 inches longer than the depth of the pocket and ¼ inch wider than the pocket. The pocket flap shall be closed by means of FR hook and loop fastener tape. A 1½ inch by 3 inch piece of FR hook fastener tape shall be installed on the inside of the pocket flap beginning at the center of

the bottom of the flap. A 1½ inch by 3 inch piece of FR loop fastener tape shall be installed horizontally on the outside of the pocket near the top center and positioned to engage the hook fastener tape. In addition, the entire inside of the pocket shall be lined with neoprene coated cotton/polyester material to ensure that the radio is protected from the elements. The impermeable barrier material shall also be sandwiched between the two layers of outer shell material in the pocket flap for added protection. The radio pocket shall measure approximately 2 inches deep by 3 inches wide by 9 inches high. The location of the radio pocket will be determined at the time of the order.

Note: radio pocket 6-inch and over in height requires trim.



MICROPHONE STRAP

A strap shall be constructed to hold a microphone for a portable radio. It shall be sewn to the jacket at the ends only. The size of the microphone strap shall be 1 inch x 3 inches and shall be constructed of double layer outer shell material.

The microphone strap shall be mounted on inside of the collar (when the collar is in the raised position). Advise left or right side at the time of order.

An additional microphone strap shall be mounted on outside of the collar (when the collar is in the raised position) Advise left or right side at the time of order.



SURVIVOR FLASHLIGHT HOLDER

Each jacket shall be equipped with a "Survivor" flashlight holder. An inward facing safety hook, attached to a double layer self material strap, shall be double stitched in a vertical position to the upper chest. The inward facing safety hook will accommodate the clip portion of the flashlight. Below the safety hook will be a strap constructed of outer shell material measuring approximately 1 ½ inches high and 9 inches wide, and will hold the barrel of the flashlight. The lower strap will be equipped with a 1 ½ inch by 2 ½ inch FR hook and loop closure at the front of the strap to facilitate easy removal of the flashlight. There shall be approximately 3 ½ inches between the upper safety hook and lower strap. The "Survivor" flashlight holder shall be sewn to the jacket, location to be advised at the time of order.

____Exception

THIRD PARTY TESTING AND LISTING PROGRAM

All components used in the construction of these garments shall be tested for compliance to NFPA Standard #1971 by Underwriters Laboratories (UL). Underwriters Laboratories shall certify and list compliance to that standard. Such certification shall be denoted by the Underwriters Laboratories certification mark.



LABELS

Appropriate warning label(s) shall be permanently affixed to each garment. Additionally, the NFPA certification label shall include the following information.

Compliance to NFPA Standard #1971

Underwriters Laboratories classified mark
Manufacturer's name
Manufacturer's address
Manufacturer's garment identification number
Date of manufacture
Size

____Comply ____Exception

ISO CERTIFICATION / REGISTRATION

The protective clothing manufacturer shall be certified and registered to ISO Standard 9001 to assure a satisfactory level of quality. Indicate below whether the manufacturer is so certified and registered by checking either "Yes" or "No" in the space provided.

WARRANTY

The manufacturer shall warrant these jackets and pants to be free from defects in materials and workmanship for their serviceable life when properly used and cared for.

____Exception

HOOK AND LOOP SUPPORT PROGRAM

Support program shall cover hook or loop tape that has begun to fray or otherwise degrade from normal wear. This program shall remain in effect for a period of five years from the original date of manufacture of the garment. This support program shall cover the repair or replacement, without charge, of any hook and/or loop on the garments produced by the manufacturer providing the garments are otherwise serviceable.

This support program does NOT cover damage from fire, heat, chemicals, misuse, accident or negligence. Failure to properly care for garments will serve to void this support program.

_____Exception

SIZING BY VENDOR

Both male and female sizing samples shall be available.

____Comply ____Exception

BAR-CODE/RECORD KEEPING INTERFACE

A 1 dimensional barcode, in the interleaved 2 of 5 format shall be printed on the label of each separable layer of the garment.

This barcode shall represent the serial number of the garment. The manufacturer shall be able to provide a detailed list of each asset of a drop-shipped order, and shall include the following:

- Brand
- Order Number

- Serial Number
- Style Number
- Color
- Description
- Chest/Waist Size
- Jacket/pant Length
- Sleeve Length
- Date of Manufacture
- Mark-For Data

This information shall be able to be imported into the manufacturers web-based system designed to facilitate the organization and tracking of assets in accordance with the cleaning and inspection requirements of OSHA and NFPA 1851.

____Comply ____Exception

PPE RECORD KEEPING

The manufacturer shall make available and no-charge, a password protected data based backed website that does not care whose brand of PPE assets are being recorded. The website shall have the functionality to allow the manufacturer to import all of the pertinent data into the department's account so that the initial data entry by fire department personnel is eliminated.

The website shall allow for the department to use a barcode scanner, if desired, to scan the Interleaved 2 of 5 barcode found in the gear by going to the Search the Serial Number page in PPE record keeping program, and scanning the asset's barcoded serial number.

____Exception

EXCEPTIONS TO SPECIFICATIONS

Any and all exceptions to the above specifications must be clearly stated for each heading. Use additional pages for exceptions, if necessary.

COUNTRY OF ORIGIN

Jackets and Pants shall be manufactured in the United States.

GENERAL SPECIFICATIONS PROTECTIVE PANTS FOR STRUCTURAL FIRE FIGHTING

October 10, 2018 Aurora FD

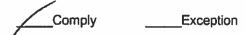
SCOPE

This specification details design and materials criteria to afford protection to the upper and lower
body, excluding head, hands, feet, against adverse environmental effects during structural fire
fighting. All materials and construction shall meet or exceed NFPA Standard #1971 and OSHA for
structural fire fighters protective clothing.

Comply Exception

OUTER SHELL MATERIAL - PANTS

The "ARMOR AP" outer shell shall be manufactured by Safety Components and constructed of 67/33 Para-Aramid/Meta-Aramid with a comfort twill weave, having an approximate weight of 6.5 oz. per square yard. The shell material must be treated with a durable water-repellent finish and the color of the garments shall be black.



(Optional) OUTER SHELL MATERIAL - PANTS

The outer shell shall be constructed of TENCATE "BRIGADE®" (Nomex®) plain weave with an approximate weight of 7.5 oz. per square yard, shall be treated with ShelltiteTM water repellent finish. Color of the garments shall be natural (off white).



THERMAL INSULATING LINER - PANTS

The thermal liner shall be constructed of 7.4 oz. per square yard Safety Components GLIDE™ ICE 2L-E89; one layer of 1.5 oz. and one layer of 2.3 oz. per square yard E-89™ spunlaced Nomex®/Kevlar® aramid blend, quilt stitched to a 60% Nomex® Filament/40% Nomex®/Lenzing spun yarn Face Cloth. The thermal liner shall be attached to the moisture barrier and bound together by bias-cut Neoprene coated cotton/polyester around the perimeter. This provides superior abrasion resistance to the less expensive, less durable "stitch and turn" method. Further mention of "Thermal Liner" in this specification shall refer to this section.

Comply	Exception
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MOISTURE BARRIER - PANTS

The moisture barrier material shall be W.L. GORE CROSSTECH® black moisture barrier - Type 2F, which is comprised of a CROSSTECH® membrane laminated to a 3.3 ounce per square yard Nomex® IIIA woven pajama check substrate. The CROSSTECH® membrane is an enhanced bicomponent membrane comprised of an expanded PTFE (polytetrafluoroethylene, for example Teflon®) matrix having a continuous hydrophilic (i.e. water-loving) and oleophobic (i.e. oil-hating) coating that is impregnated into the matrix. CROSSTECH® moisture barrier seams shall be sealed with GORE-SEAM® tape using a Series 6000 (or higher) GORE-SEAM™ sealing machine to afford comparable bacteriophage penetration resistance performance. Further mention of "Specified Moisture Barrier" in this specification shall refer to this section.

____Comply ____Exception

SEALED MOISTURE BARRIER SEAMS

All moisture barrier seams shall be sealed with a minimum 1 inch wide sealing tape. One side of the tape shall be coated with a heat activated glue adhesive. The adhesive side of the tape shall be oriented toward the moisture barrier seam. The adhesive shall be activated by heat and the sealing tape shall be applied to the moisture barrier seams by means of pressure exerted by rollers for that purpose.

____Comply ____Exception

METHOD OF THERMAL LINER/MOISTURE BARRIER ATTACHMENT FOR AND PANTS

The thermal liner and moisture barrier shall be completely removable from the pant shell. Nine snap fasteners shall be spaced along the waistband to secure the thermal liner/moisture barrier to the shell. The legs of the thermal liner/moisture barrier shall be secured to the shell by means of Ara-Shield® snap fasteners, 2 per leg. The Ara-shield® snap tabs shall be color coded to a corresponding color-coded snap tab in the liner for ease of matching the liner system to the outer shell after inspection or cleaning is completed.

____Comply ____Exception

THERMAL PROTECTIVE PERFORMANCE

The assembled garment, consisting of an outer shell, moisture barrier, and thermal liner, shall exhibit a TPP (Thermal Protective Performance) rating of not less than 35.

____Comply ____Exception

STITCHING

The outer shell shall be assembled using stitch type #301, #401, #514 and #516. The thermal liners and moisture barriers shall be assembled using stitch type #301, #401, #504, #514, and #516. Major A outer shell structural seams, major B structural liner seams and shall have a minimum of 8 to 10 stitches per inch. All Major A seams shall be sewn with ball point needles only. All seams shall be continuously stitched only.

____Comply ____Exception

PANT CONSTRUCTION

BODY

The pant design facilitates the transfer of the weight of the pant to the hips instead of the shoulders and suspenders.

The body of the shell shall be constructed of four separate body panels consisting of two front panels and two back panels. The body panels shall be shaped so as to provide a tailored fit, thereby enhancing body movement, and shall be joined together by double stitching with Nomex thread. The body panels and seam lengths shall be graded to size to assure accurate fit in a broad range of sizes.

The front body panels shall be wider than the rear body panels to provide more fullness over the knee area. This is accomplished by rolling the side leg seams (inside and outside) to the rear of the pant leg beginning at the knee. The slight taper shall prevent premature wear of the side seams by pushing them back and away from the primary high abrasion areas encountered on the sides of the lower legs.

____Exception

SIZING

In order to insure that every member of the department can safely perform to the maximum of their ability without extra bulk and without restriction, Pants shall be available in all sizes and dimensions as follows:

Pants:

Gender: Gender specific Men's and Women's patterns

Waist: Even sizes ranging from 24 to 56

Body Shape: Relaxed and Regular

Note: Relaxed is a fuller cut in the hips and thighs, like relaxed jeans.

Inseam: Even sizes

Pants available in only one standard shape shall not be acceptable. Generalized sizing, such as small, medium, large, etc., shall not be considered acceptable.

____Comply ____Exception

PANT LINER SYSTEM

The combined moisture barrier and the thermal liner shall be completely removable for the pant. The thermal liner and moisture barrier layers of the liner system shall be stitched together and bound around the top waist and cuffs with Bias-Cut Neoprene coated cotton/polyester binding for a finished appearance that prevents fraying and wicking of contaminants.

The body of the liner system (thermal liner & moisture barrier) shall be of a four-piece design to match the cut of the shell to include the rolled back side seams. The design of the liner system shall incorporate darts in the knee area providing a contour to the leg and shall also have a reverse boot cut at the rear of the liner cuff and a concave cut at the front to keep the liner from hanging below the shell.

____Comply ____Exception

LINER ACCESS OPENING - PANT

The thermal liner and moisture barrier layers of the pant liner system shall be constructed in such a way as to allow an access opening for interior inspection, service and replacement. The thermal liner and moisture barrier layers shall be stitched together for security and prevention of inadvertent use of one layer without the other. The liner system shall have a reinforcement material sewn to the bottom of the fly opening. This reinforcement shall serve to prevent the liner from tearing in that area from the constant donning and doffing of the pants.

The liner system of the pant shall incorporate an opening along the back of the waistline for ease in inspecting the inner layers and to facilitate performing the complete Liner Inspection. The thermal liner and moisture barrier shall be individually bound with a neoprene coated bias cut tape and joined together on each of the front panels, along the waistband from the front fly opening to side seam. The back of the liner system shall be allowed to remain open with two snaps on either side of the back seam to attach the moisture barrier layer to the thermal liner layer. As described previously, the pant thermal layer system snaps directly to the independent waistband by means of nine snap fasteners. There shall be no hook and loop used to close the liner access opening.

____Exception

WAISTBAND

The waist area of the pants shall be reinforced on the inside with a separate piece of black aramid outer shell material, cut on the bias (diagonally). The reinforcement shall be folded in half, for a finished bottom edge and shall have a finished width of not less than approximately 1½ inches. The top edge of the waistband reinforcement shall be double stitched to the outer shell at the top of the pants. The lower edge of the waistband shall be unattached to the shell to accept the thermal liner and moisture barrier. The top of the thermal liner and moisture barrier shall be secured to the underside of the waistband reinforcement by means of nine snaps, spaced equidistant along the length of the waistband reinforcement. Inserting the liner system between the waistband reinforcement and outer shell serves to reduce the possibility of liner detachment while donning and doffing. The independent waistband construction affords greater comfort and fit than a turned and stitched method. Pants that do not include an independent waistband or are not cut on the bias shall not provide the same amount of stretch to the garment and shall be considered unacceptable.

___Comply ____Exception

EXTERNAL/INTERNAL FLY FLAP

The pants shall have a vertical outside fly flap constructed of two layers of outer shell material, with a layer of moisture barrier material sandwiched between. The fly flap shall be double stitched to the left front body panel and shall measure approximately 2½ inches wide, with a length graded to size based on waist measurement and reinforced with bartacks at the base. An internal fly flap constructed of one layer of outer shell material, thermal liner and specified moisture barrier, measuring approximately 2 inches wide, with a length graded to size based on waist, shall be sewn to the leading edge of the right front body panel. The inside of the right front body panel shall be thermally enhanced directly under the outside fly with a layer of moisture barrier and thermal liner material.

The underside of the outside fly flap shall have a 1½ inch wide piece of FR loop fastener tape quadruple stitched along the full length and through the shell material only; stitching shall not penetrate the moisture barrier insert between the two layers to insure greater thermal protection and reduced water penetration. A corresponding strip of 1½ inch wide piece of FR hook fastener tape shall be quadruple stitched to the outside right front body panel securing the fly in a closed position.

Appropriate snap fastener halves shall be installed at the leading edge of the waistband for the purpose of further securing the pants in the closed position.



RETROREFLECTIVE FLUORESCENT TRIM

The pants shall have a stripe of retroreflective fluorescent trim encircling each leg below the knee to comply with the requirements of NFPA #1971 in 3 inch lime/yellow 3M Scotchlite™ Triple Trim (L/Y borders with silver center). Bottom of trim band shall be located approximately 3" above cuff.



REINFORCED TRIM STITCHING

All reflective trim is secured to the outer shell with Nomex® thread, using a locking chainstitch protected by our exclusive TrimTrax® system. Developed exclusively by Globe Manufacturing Co., LLC. this strip of 3/32-inch strong, durable, flame resistant black Kevlar® cording provides a bed for the stitching along each edge of the retroreflective fluorescent trim surface and affords extra protection for the thread from abrasion. TrimTrax® has been proven to be 5 to 7 times more durable than single or even double rows of stitching, significantly reducing maintenance costs and providing more value and a longer service life. Two rows of stitching used to attach the trim in place of the TrimTrax® shall be considered an unacceptable alternative, since it has been proven that the two rows of stitching has insignificant impact on wear life. All trim ends shall be securely sewn into a seam for a clean finished appearance.



BLACK ARAMID BELT WITH BELT LOOPS

If the IH Pant is ordered with either an Escape Belt or a Harness, that belt shall be installed as the positive pant closure. If neither an Escape Belt or a Harness is specified, the IH Pant shall include an approximate 2-inch wide belt constructed of aramid webbing material with an adjustable hi-temp thermoplastic Delrin buckle serving as the exterior primary positive locking closure. This buckle shall also provide a quick-release mechanism for donning and doffing.

The pants shall be equipped with a series of belt loops, spaced around the waist to accommodate an Escape Belt, a Harness or the aramid belt. One loop shall be located on the rear of the waist, centered over the rear seam, measuring approximately 3½ inches by 3½ inches. There shall be two additional wide loops at the front of each pant. The top of these two belt loops shall be angled, with the top measuring approximately 2½ inches and the bottom measuring approximately 4½ inches. Under each of the front belt loops there shall be a slit to accommodate an internal harness passing from the inside of the pant, to the outside. The slits shall be at the same angle as the front belt loops, reinforced with black Ara-Shield® material, and having an opening that measures approximately 3 inches.

There shall be 2-piece loops constructed of a double layer of black aramid material installed inside the shell in the hip area, which shall serve to hold the leg loops of an optional internal harness in place. The top and bottom of the loops shall attach to each other with an approximate 1 inch by 1 inch FR hook and loop fastener tape sew to the ends.

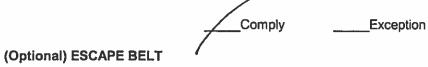
In addition to the 3 wide belt loops, there shall be two rappelling harness loops installed at the rear of the pant, just behind each side seam. The loops shall be constructed of a double layer of outer shell material and shall be of a 2-piece design – top and bottom. The top and bottom of each loop shall attach to each other with snap fasteners and FR hook and loop fastener.



CARABINER HOLD DOWN STRAP

The pant shall be equipped with a carabiner hold down strap. The strap shall be constructed of double layer black Ara-Sheild® material, consisting of two separate portions to form a strap with an opening of approximately 3 inches. Each portion of the strap shall measure approximately 1½ inches wide by 3½ inches long. The lower portion of the strap shall be double needle stitched in the vertical position, opening upwards. There shall be a piece of 1½ by 2½ inch hook FR fastener tape single needle stitched to the strap approximately ¼ inch up from the bottom. The upper portion of the strap shall be double needle stitched in the vertical position, opening downwards to interface with the lower portion of the strap. There shall be a piece of corresponding 1½ by 2½ inch loop FR fastener tape single needle stitched to the strap approximately ½ inch down from the top of the strap. On both the upper and lower portions of the strap, there shall be a bartack centered between the double needle stitching. The strap shall be located behind the left front belt loop.

In the event the IH Pant is ordered with the Escape Belt, there shall be an additional carabiner hold down strap, added to the right front belt loop.



The pant shall have an integrated Escape Belt, which is independently certified as meeting the belt requirements of NFPA 1983, Standard on Life Safety Rope and Equipment for Emergency Services. The Escape belt shall be comprised of Kevlar® webbing with a hook and an adjustable D-ring closure, graded for the waist size of the pants. The hook and dee closure system of the Escape Belt also serves as the positive front closure for the pants, eliminating redundant closure systems.



(Optional) INTERNAL SEAT HARNESS SERIES 3

The internal seat harness shall be independently certified to NFPA 1983, Standard on Life Safety Rope and Equipment for Emergency Services as a Class II harness. The belt shall be comprised of Kevlar webbing with a hook and an adjustable D-ring closure, graded for the waist size of the pants. The hook and dee closure system of the Harness Belt also serves as the positive front closure for the pants. Attached to the waist belt are a left and a right 2 inch Kevlar webbing leg loop, constructed without hardware and graded for the circumference of the pant legs. These loops are designed to be installed on

each separate leg of the liner on the inside of the outer shell. Additionally the harness shall have attachment loops located on either side of the belt buckle, which thread through slots in the outer shell. These loops are designed to receive a carabineer when the system is used as a harness. There shall be 2-piece loops constructed of a double layer of outer shell material installed at each hip and inside the shell 8" down from the waist to hold the leg straps in place. The top and bottom of the loop will attach to each other with a 1 inch x 1 inch flame resistant hook & loop fastener tape sewn to ends.



AXTION® SEAT

The rise of the rear pant center back seam, from the top back of the waistband to where it intersects the inside leg seams at the crotch, shall exceed the rise at the front of the pant by approximately 8 inches. The longer rear center back seam provides added fullness to the seat area for extreme mobility without restriction when stepping up or crouching and shall be graded to size. This feature in combination with other design elements shall maintain alignment of the knee directly over the knee pads when kneeling and crawling.



EXPANSION (BELLOWS) POCKETS (Left)

One 2 inch deep by 10 inch wide by 10 inch high bellows pocket shall be placed over the outer leg seams at thigh level. The pocket shall be sewn to the pant with two rows of lock stitching and shall provide two aluminum eyelets, installed at the bottom of the pocket, for water drainage. The pocket shall be reinforced with an additional layer of Kelvar material sewn to the inside. The pocket flap shall be rectangular in shape, constructed of two layers of outer shell material and double stitched to the outer shell. Two pieces of 1½ inch by 3 inch FR hook fastener tape shall be installed on the inside of the pocket flap vertically on each end of the flap. Two piece of corresponding 1½ inch by 3 inch FR loop fastener tape shall be installed horizontally on the outside of each end of pocket near the top and positioned to engage the hook fastener tape. Each pocket flap shall be reinforced with backtacks at the uppermost corners.



EXPANSION (BELLOWS) IH ROPE POCKET (Right)

One 2 inch deep x 10 inch wide x 10 inch high bellows pocket shall be placed over the outer leg seam at thigh level. The pocket shall be sewn to the pant with two rows of lock stitching and shall provide two eyelets, installed at the bottom of each pocket, for water drainage. The pocket shall be reinforced with an additional layer of outer Kevlar® material sewn to the inside. The pocket flap shall be rectangular in shape and measure a minimum of 6 inches by a minimum of 11 inches, constructed of two layers of outer shell material and double stitched to the outer shell. Six pieces of 1½ inch by 3 inch FR hook fastener tape shall be installed vertically on the inside of each pocket flap - the six pieces shall form three rows, one each side and one in the middle, each row consisting of two pieces of FR hook fastener tape. Three pieces of 1 ½ inch by 3 inch FR loop fastener tape shall be installed horizontally on the outside of the pocket near the top and positioned to engage the hook fastener tape. The pocket flap shall be reinforced with backtacks at the uppermost corners. A 2-piece loop constructed of a double layer of black outer shell material shall be installed under the front edge of the pocket flap. The top and bottom of the loop shall attach to each other with a 1 inch x 1 inch FR hook and loop fastener tape sewn to ends. Inside the pocket, a strap constructed of black outer shell material measuring approximately 1 inch by 9 inches (when hook and loop is engaged) shall run the full vertical height of the pocket where it shall secure at the top with hook and loop fastener tape. A second strap shall be installed horizontally at the top front corner of the pocket. This strap shall be constructed of black outer shell material and measure approximately 1 inch by 4 inches and shall be sewn at one end and attach at the other end with hook and loop fastener tape. The straps are specially designed to secure the contents of the pocket and allow for quick release.

____Comply ____Exception

AXTION® KNEE

The outer shell of the pant legs shall be constructed with horizontal expansion pleats in the knee area with corresponding darts in the liner to provide added fullness for increased freedom of movement and maximum flexibility. The pleats shall be folded to open outwardly towards the side seams to insure no restriction of movement. The AXTION® knee shall be installed proportionate to the pant inseam, in such a manner that it falls in an anatomically correct knee location.

The thermal liner shall be constructed with four darts per leg in the front of the knee. Two darts shall be located above the knee (one on each side) and two shall be located below the knee (one on each side). On the moisture barrier, the system shall consist of two darts, rather than pleats, to allow added length in the under knee. The darts in the liner provide a natural bend at the knee. The darts in the liner work in conjunction with the expansion panels in the outer shell to increase freedom of movement when kneeling, crawling, climbing stairs or ladders, etc.



LINER KNEE THERMAL ENHANCEMENT

A minimum of one additional layer of specified thermal liner and one additional layer of moisture barrier material, measuring a minimum of 9 inches by 11 inches, shall be sewn to the knee area of the liner system for added CCHR protection and increased thermal insulation in this high compression area. The knee thermal enhancement layers shall be sandwiched between the thermal liner and moisture barrier layers of the liner system and shall be stitched to the thermal liner layer only. The thermal enhancement layer shall have finished edges by means of overedging. Raw or unfinished edges shall be considered unacceptable. Thermal scraps shall not be substituted for full-cut fabric padding. Smaller CCHR reinforcements shall not be considered acceptable since they provide far less area of coverage.

____Comply ____Exception

KNEE REINFORCEMENTS

The knee area shall be reinforced with black Ara-Shield® material.

The knee reinforcement shall be centered on the leg to insure proper coverage when bending, kneeling and crawling. The knee reinforcements shall measure approximately 9 inches wide by 12 inches high and shall be double stitched to the outside of the outer shell in the knee area for greater strength and abrasion resistance. Knee reinforcements of a smaller size do not provide the same protective coverage and shall be considered unacceptable. The knee reinforcement specified shall be removable for replacement without opening Major A seams of the outer shell of the pant. The lower edge of the Ara-Shield® knee reinforcement shall be turned under so that the lower row of stitching is covered and protected from abrasion.



PADDING UNDER KNEE REINFORCEMENTS

Padding for the knees shall be accomplished with one layer of Silizone® foam, sandwiched between the thermal liner and moisture barrier. The placement of Silizone® padding on the thermal versus the shell reduces bulk in the shell and also serves to protect the padding from abrasion and other wear issues that the outer shell is subject to. Pants with Silizone® knee padding on the shell as opposed to on the liner, do not provide the same level of bulk reduction and abrasion resistance and are not recommended.



PANT CUFF REINFORCEMENTS

The cuff area of the pants shall be reinforced with black Ara-Shield® material. The cuff reinforcement shall not be less than 2 inch in width and folded in half, approximately one half inside and one half outside the end of the legs for greater strength and abrasion resistance. The cuff reinforcement shall be double stitched to the outer shell for a minimum of two rows of stitching. This independent cuff provides an additional layer of protection over a hemmed cuff. Pants that are turned and stitched at the cuff, as opposed to an independent cuff reinforcement, do not provide the same level of abrasion resistance and shall be considered unacceptable.



PADDED RIP-CORD SUSPENDERS & ATTACHMENT

On the inside waistband shall be attachments for the standard "H" style "Padded Rip-Cord" suspenders. There shall be four attachments total -2 front, 2 back. The suspender attachments shall be constructed of black Ara-Shield® material measuring approximately $\frac{1}{2}$ inch wide by 3-inches long. They shall be sewn in a horizontal position on the ends only to form a loop. The appearance shall be much like a horizontal belt loop to capture the suspender ends.

A pair of "H" style "Padded Rip-Cord" suspenders shall be specially configured for use with the pants. The main body of the suspenders shall be constructed of 2 inch wide black webbing straps. The suspenders shall run over each shoulder to a point approximately shoulder blade high on the back, where they shall be joined by a 2 inch wide horizontal piece of webbing measuring approximately 8-inches long, forming the "H". This shall prevent the suspenders from slipping off the shoulders. The shoulder area of the suspenders shall be padded for comfort by fully encasing the webbing with aramid batting and wraparound black aramid.

The rear ends of the suspenders shall be sewn to 2-inch wide elasticized webbing extensions measuring approximately 8-inches in length and terminating with thermoplastic loops. The forward ends of the suspender straps shall be equipped with specially configured black powder coat non-slip metal slides with teeth. Through the metal slides shall be the 9 inch lengths of strap webbing "Rip-Cords" terminating with thermoplastic loops on each end. Pulling on the "Rip-Cords" shall allow for quick adjustment of the suspenders.

Threaded through and attached to the thermoplastic loops on the forward and rear ends of the suspenders shall be black aramid suspender attachments incorporating two snap fasteners. The aramid suspender attachments are to be threaded through the suspender attachment loops on the inside waistband of the pants. The aramid suspender attachments shall then fold over and attach to themselves

securing the suspender to the pants.

____Comply ____Exception

REVERSE BOOT CUT

The outer shell pant leg cuffs shall be constructed such that the back of the leg is approximately 1 inch shorter than the front. The liner shall also have a reverse boot cut at the rear of the cuff and a concave cut at the front to keep the liner from hanging below the shell. This construction feature shall minimize the chance of premature wear of the cuffs and injuries due to falls as a result of "walking" on the pant cuffs.

____Comply ____Exception

THIRD PARTY TESTING AND LISTING PROGRAM

All components used in the construction of these garments shall be tested for compliance to NFPA Standard #1971 by Underwriters Laboratories (UL). Underwriters Laboratories shall certify and list compliance to that standard. Such certification shall be denoted by the Underwriters Laboratories certification mark.

____Comply ____Exception

LABELS

Appropriate warning label(s) shall be permanently affixed to each garment. Additionally, the NFPA Certification label shall include the following information.

Compliance to NFPA Standard #1971
Underwriters Laboratories classified mark
Manufacturer's name
Manufacturer's address
Manufacturer's garment identification number
Date of manufacture
Size

____Comply ____Exception
ISO CERTIFICATION / REGISTRATION

The protective clothing manufacturer shall be certified and registered to ISO Standard 9001 to assure a satisfactory level of quality. Indicate below whether the manufacturer is so certified and registered by checking either "Yes" or "No" in the space provided.

Yes ____No

The manufacturer shall warrant these jackets and pants to be free from defects in materials and workmanship for their serviceable life when properly used and cared for.

____Comply ____Exception

HOOK AND LOOP SUPPORT PROGRAM

Support program shall cover hook or loop tape that has begun to fray or otherwise degrade from normal wear. This program shall remain in effect for a period of five years from the original date of manufacture of the garment. This support program shall cover the repair or replacement, without charge, of any hook and/or loop on the garments produced by the manufacturer providing the garments are otherwise serviceable.

This support program does NOT cover damage from fire, heat, chemicals, misuse, accident or negligence. Failure to properly care for garments shall serve to void this support program.



SIZING BY VENDOR

Both male and female sizing samples shall be available.



BAR-CODE/RECORD KEEPING INTERFACE

A 1 dimensional barcode, in the interleaved 2 of 5 format shall be printed on the label of each separable layer of the garment.

This barcode shall represent the serial number of the garment. The manufacturer shall be able to provide a detailed list of each asset of a drop-shipped order, and shall include the following:

- Brand
- Order Number
- Serial Number
- Style Number
- Color
- Description
- Chest/Waist Size
- Jacket/pant Length
- Sleeve Length
- Date of Manufacture
- Mark-For Data

This information shall be able to be imported into the manufacturers web-based system designed to facilitate the organization and tracking of assets in accordance with the cleaning and inspection requirements of OSHA and NFPA 1851.



PPE RECORD KEEPING

The manufacturer shall make available and no-charge, a password-protected data based backed website that does not care whose brand of PPE assets are being recorded. The website shall have the functionality to allow the manufacturer to import all of the pertinent data into the department's account so that the initial data entry by fire department personnel is eliminated.

The website shall allow for the department to use a barcode scanner, if desired, to scan the Interleaved 2 of 5 barcode found in the gear by going to the Search the Serial Number page in PPE record keeping program, and scanning the asset's barcoded serial number.

____Comply ____Exception

EXCEPTIONS TO SPECIFICATIONS

Any and all exceptions to the above specifications must be clearly stated for each heading. Use additional pages for exceptions, if necessary.

COUNTRY OF ORIGIN

Jackets and Pants shall be manufactured in the United States.

Specifications for Structural Fire Fighting 14" Pull-On Boots Globe FootGear Structural Shadow™

NFPA 1971 and NFPA 1992 Certified

Certified to NFPA 1971, Standard on Protective Ensembles for Structural Firefighting and Proximity Firefighting, Current Edition for Structural Fire Fighting and NFPA 1992, Standard on Liquid Splash-Protective Ensembles and Clothing for Hazardous Materials Emergencies, Current Edition.

Exception

General Design

14 inch Pull-On athletic footwear (cement construction) boot, black flame-resistant and water-resistant leather, double-stitched leather joining seams, webbing pull straps, leather collar, padded leather flex joints in the shaft above vamp and heel, liquid and chemical resistant breathable bootie liner, cutresistant and thermal protective bootie-shield liner, composite safety toe cap, composite shank, composite penetration-resistant insole barrier, molded shin guard, flame-resistant synthetic rubber molded cup outsole and toe bumper, 3D lasting board, molded composite heel counter, internal heel fit system, and a removable molded footbed as well as an additional insert for use in conjunction with the footbed.

Slip Resistance

Boots must exceed the minimum test values for slip resistance (average of left and right foot) as detailed below to provide superior performance in dry, wet, and frosted ice conditions. Boots that do not exceed these minimums in all conditions shall not be acceptable. Bidders must promptly supply a Technical Services Report from a recognized independent testing laboratory upon request showing the boots bid exceed this requirement.

Exception

Test Method: SATRA TM144:2011

Slip Resistance of Footwear and Floorings

Load = 500 N

Forepart > 1.00 Dry Clay Quarry Tile:

Heel > 1.00

Wet Clay Quarry Tile: Forepart > 0.60

Heel > 0.60

Frosted Ice -7°C Run 1: Forepart = 0.28

Heel = 0.28

Frosted Ice -7°C Run 4: Forepart > 0.12

Heel > 0.12

For maximum slip resistance each outsole shall have Siping lines. Siping lines cut into flat areas open up when flexed to provide additional traction on water and ice. The boot shall also include self-cleaning lugs and an omni-direction tread pattern designed for superior performance in all terrains and when working on ladders.

Exception

Flexibility

Boots must reach the Maximum Flex Angle of 48 degrees without exceeding the critical bending moment with a resulting stiffness index less than 10.0 as detailed below to provide maximum flexibility. Boots that do not meet this requirement shall not be acceptable. Bidders must promptly supply a Technical Services Report from a recognized independent testing laboratory upon request showing the boots bid meet this requirement.

Test Method:	SATRA TM194:2004	
	Longitudinal stiffness	of footwear
FireStorm Leather	Comply	Exception

Boots shall be made from heavy-duty, flame-resistant and water-resistant full-grain cattle hide leather measuring 2.0 - 2.2 mm of thickness for durable tear and puncture resistance. Tumbled full-grain cattle hide leather shall be utilized in the collar and flex areas for mobility. The leather shall be chrome tanned to withstand high temperature with minimal shrinkage, re-tanned to impart water resistance and low water absorption, and finished to retain maximum breathability. Leather shall meet or exceed the following physical tests:

Water Penetration	ASTM D2099	15,000 flex minimum
Dynamic Water Absorption	ASTM D2099	15% maximum
Static Water Absorption	ASTM D6015	30% maximum
Slit Tearing Strength	ASTM D2212	30 pound minimum
Moisture Vapor Transmission	ASTM D5052	350 g/meter2/24 hours minimum
Flame Resistance	NFPA 1971	afterflame no more than 2.0 sec,
		not melt or drip, no burn through
	Comply	Exception
	4	

CROSSTECH® Footwear Fabric

A full-height, full sock, bootie liner made from a package of Omaha lining fabric, 300g felt insulation, and CROSSTECH® moisture barrier shall be provided for a liquid resistant breathable moisture barrier as well as thermal protection as defined by the specified NFPA standards.



Athletic Footwear (Cement) Construction Outsole

For optimum flexibility, comfort, and weight reduction, the boot shall include a VIBRAM® Synthetic Rubber Sculpted, Contoured Cup Outsole cemented to the bottom and sides of the upper using a 2part cross-linking adhesive that forms a bond stronger than the materials it attaches. The outsole must be made from a flame, abrasion, oil, acid, and slip resistant compound engineered for high-traction, cold-weather resistance, and durability. Goodyear welt or direct attach construction methods shall not be acceptable.

Bootie-Shield Liner

A protective bootie-shield of KEVLAR® fiber blend stitchbonded non-woven batting weighing 4.0 oz/yd2 shall be positioned between the leather shell and the CROSSTECH® moisture barrier bootie to provide abrasion and cut resistance and additional thermal protection. Boots that do not have an additional FR protective bootie-shield between the leather shell and the CROSSTECH® moisture barrier bootie shall not be acceptable.

__Comply

Composite Safety Toe Cap

The safety toe shall consist of a composite material that is lighter than steel, does not transmit heat or cold, and will spring back to shape after impact. Must exceed NFPA standards for safety. Metal toe caps shall not be acceptable.		
caps shall not be acceptable. ComplyException		
Leather Collar The collar shall have a rolled top edge formed by folding over the leather to help the boots slide against the pants liner and reduce the potential for the pants liner to hang up on the top of the boots as well as to reduce abrasion against the wearer's calf.		
ComplyException		
Composite Penetration Resistant Insole Barrier Penetration resistance shall be provided by a composite insole to maximize flexibility and insulate from heat and cold transmission. Must exceed NFPA standards for safety. Metal plates shall not be acceptable.		
Exception		
3D Composite Lasting Board Boot uppers shall be lasted to a molded and contoured lasting board with a built-in flex zone in the forefoot with a torsionally stable heel. Flat fiber board lasting boards shall not be acceptable.		
Exception		
Composite Shank The shank shall consist of a composite material that is lighter than steel, does not transmit heat or cold, and springs back to shape better. Metal shank shall not be acceptable.		
ComplyException		
Molded Heel Counter Boots shall have a molded heel counter of water-resistant composite material individually molded to fit each size perfectly. Leather or fiber board heel counters shall not be acceptable.		
Exception		
Padded Shin Guard Boots shall include a padded composite shin guard to provide extra protection when working on a ladder. Moisture absorbing natural fiber padding shall not be acceptable.		
ComplyException		
Boots shall include a molded Flame Resistant (FR) synthetic rubber toe bumper to provide abrasion resistance when crawling. The toe bumper shall be cemented and 2-needle stitched to the vamp.		
ComplyException		
Webbing Pull-Straps		

Boots shall have NOMEX® webbing pull-straps securely attached to the leather uppers by inserting into to collar seam to minimize stitching through the leather. Pull strength must be a minimum of 120 lbs when tested with a single handle.
Exception
Internal Fit System Boots shall have an anatomical foam insert that wraps around the top and sides of the heel with an opening to fit and hold the back of the heel securely while cushioning the ankle.
ComplyException
3D Molded Footbeds System Boots shall have a removable urethane foam footbed. The footbeds are contoured to cradle and cushion the bottom of the foot and to provide arch support. The footbeds shall have a moisture-wicking and anti-microbial fabric top layer. A second pair of 3D molded footbeds that are thicker in the forefoot is provided with every pair for a custom fit. This thicker footbed provides a snugger fit.
ComplyException
Sizes Boots must be available in Men's full sizes $5-18$ and half sizes $5\frac{1}{2}-15\frac{1}{2}$ in Narrow, Medium, Wide, and X-Wide widths. Boots must also be available in a Wide Calf model in the same size range that will provide an additional 3 inches in circumference at the calf to fit those with larger calves. Boots must be available in Women's full sizes $5-12$ and half sizes $5\frac{1}{2}-11\frac{1}{2}$ in Narrow, Medium, Wide, and X-Wide widths.
Exception
Resoling Service The winning vendor shall have resoling services available at their factory as needed.
ComplyException
Country of Origin Boots shall be manufactured in the United States.
ComplyException
Third Party Testing and Listing Program The footwear shall be tested for compliance to NFPA Standard 1971 and 1992 by a recognized independent testing lab which shall certify and list compliance to that standard. Such certification shall be denoted by the independent testing labs mark on the certification label affixed to the boots.
ComplyException

Labels

Appropriate warning label(s) shall be permanently affixed to each boot. Additionally, the label(s) shall include the following information.

Compliance to applicable NFPA Standard(s), current edition(s). Independent Testing Lab mark Manufacturer's name Manufacturer's address

Many of the second by the indepth of the second sec
Manufacturer's boot identification number Date of manufacture
Size
ComplyException
ISO Certification/Registration The manufacturer shall be certified and registered to ISO Standard 9001 to assure a satisfactory level of quality.
ComplyException
Warranty The manufacturer shall warrant these boots to be free from defects in materials and workmanship for one year when properly used and cared for.
ComplyException
Sizing by Vendor The vendor shall be available to perform all sizing requirements.
Exception
PPE Record Keeping
The manufacturer shall make available at no-charge, a password protected data based backed website

The website shall allow for the department to use a barcode scanner, if desired, to scan the Interleaved 2 of 5 barcode found in the gear by going to the Search the Serial Number page in PPE record keeping program, and scanning the asset's barcoded serial number.

that allows all brands of PPE assets are being recorded. The website shall have the functionality to allow the manufacturer to import all of the pertinent data into the department's account so that the initial data

> Comply Exception

Exceptions to Specifications

entry by fire department personnel is eliminated.

Any and all exceptions to the above specifications must be clearly stated for each heading. Use additional pages for exceptions, if necessary.



USTM Traditional Series Structural Fire Helmet Technical Specifications

Helmets for Structural Firefighting shall meet or exceed NFPA 1971, Standard on Protective Ensemble for Structural Fire Fighting and Proximity Fire Fighting, 2013 Edition (Pertaining to Structural Fire Helmets).

Certification/verification shall be furnished by written documentation supplied by a recognized independent third party test laboratory.

A sample helmet meeting the requirements of this specification shall be supplied upon request for inspection and verification of compliance within 10 working days.

The authority having jurisdiction reserves the right to accept bids submitted per their evaluation based upon compliance to the standard performance and any other applicable requirements concerning fit and function.

The authority having jurisdiction reserves the right to accept the most appropriate helmet based on the above stated criteria without regard to lowest price offerings.

Once awarded, successful bidders shall ship helmets from the manufacturer within 14 working days of manufacturer's receipt of order from the distributor.

General

Helmets conforming to this specification are designed to help protect the firefighter from head and neck injuries related to structural firefighting activities.

The helmet manufacturer shall be a certified ISO 9001 company to assure quality procedures and production capabilities.

Physical Configuration

The basic helmet shall be a flared, rear-brim design with a length of 15-5/8", a width of 12", and a height of 7".

Shell

The helmet shell shall be of Traditional style with four primary and four secondary ribs bisecting the dome. The shell shall be comprised of a composite fiberglass with a thermoset fire retardant resin. Color pigment shall be added to the resin as part of the manufacturing process that molds the helmet to maintain appearance by masking chips and scratches that might occur in daily wear and tear. The shell finish shall be a non-glossy "matte" style and shall be available in yellow, red, black, white, camouflage, pink camo, blaze camo, winter camo, and pink ribbon.

The edge of the composite shell shall have an aluminum reinforced, elastomeric edge beading that is secured at the rear of the brim by a brass clip and D-ring fastened by a brass rivet. The edge beading shall not melt, drip, or ignite when tested to NFPA 1971-2013 Section 5-2.4 Heat Resistance requirement.

Leather Front & Holders

A stamped, embossed, brass sheet front shall be provided in the form of an eagle to be attached by two solid brass bolts and nuts. The beak of the eagle shall be formed to hold the top of a leather identification shield. Two brass support arms shall fork and extend downward from the eagle head 3-1/2" from the tip of the eagle beak to form the lower supports for attachment of the leather identification shield. An arched brass bar shall be attached to the two lower support arms of the eagle to form a cross bar support. An 8-32 threaded hole shall be provided at the lower support arms of the eagle to accept the two brass screws which hold both the cross bar support and the leather identification shield.

Helmet shall be made available with optional 5" or 6" leather identification shield. Leather identification shields shall have the option of shipping loose or attached to a helmet, and shall have a lead time that is no greater than the standard helmet lead time. For more information about leather identification shields, please visit our website: https://www.bullard.com/products/fire-and-rescue-helmets/customized-leather-fronts

Impact Liner System

The impact liner shall consist of a urethane foam liner glued to a black high-heat resistant inner shell with a heat deflection temperature > 220° F @ 264 psi. The urethane foam liner shall be formed without the use of CFCs to eliminate the potential for additional expansion when subjected to heat during actual use.

The black inner shell shall have four 1" x 3" pieces of adhesive-backed hook material attached, two to each side, to secure the ear/neck protector at the sides of the inner shell.

Crown Strap Suspension System

The crown strap suspension system shall be three 3/4" nylon web straps attached to six nylon keys. The keys shall be locked into the lip of the inner shell against the urethane impact liner.

Ratchet Headband

The helmet shall have a quick-adjustment sizing capability by means of a ratchet adjustment system attached to a heat-resistant nylon headband. The headband shall be attached to the inner shell by four black acetal buttons (two front, two rear). The headband shall have the ability to be raised or lowered inside of the inner shell by location points on the headband. This adjustment shall not affect the height of the helmet on the firefighter's head.

The ratchet portion of the headband shall have a ratchet height adjuster located at the rear of the headband, inside of the inner shell, to permit the ratchet to be positioned for comfort on the nape of the firefighter's head. This ratchet height adjuster shall permit at least 1" of travel by means of three height adjustment keys for proper fit. This independent adjustment component shall have a 3/4" piece of adhesive-backed Velcro hook material attached at the center rear of this component to secure the rear portion of the ear/neck protector.



Brow Pad

The headband shall be supplied with a fire retardant (FR) cotton brow pad sewn around the perimeter, backed with foam cushion padding material at the forehead, that is removable for laundering and replacement. Attachment to the headband with stitching will not be permitted. A leather brow pad option must be available.

Chinstran

The chinstrap shall be two pieces of 3/4" black Nomex® webbing with a super tough nylon quick release buckle and a chrome-plated postman's slide fastener,

The male side of the quick-release buckle shall be anchored to the right side of the outer shell with a dielectric anchor block secured to the mounting bracket with two stainless steel screws, or for Retrak Series chinstraps, with three stainless steel screws. The long portion of the chinstrap with the female side of the quick-release buckle and the postman's slide fastener shall be attached to the left side of the outer shell in the same manner.

When the chinstrap is connected and fully extended, maximum length shall be at least 24" when measured from one anchor block to the opposite anchor block.

Ear/Neck Protector

The ear/neck protector shall consist of a 6 oz. rip-stop Nomex outer shell backed with three layers of FR cotton flannel for comfort and protection. A 1" strip of loop material shall be stitched in one continuous band across the top of the outer shell of the ear/neck protector for attachment to the inner shell.

When properly attached to the inner shell of the helmet, the ear/neck protector shall have the following minimum coverage to the sides and rear of the helmet brim:

- 1. 6" from the sides of the helmet brim at the chinstrap.
- 2. 6-1/2" from the center rear of the helmet brim.

Eye Protection

Per the requirements listed in NFPA 1971, one of the following eye protection options must be specified with the helmet.

ReTrak* Visor

The visor, when not deployed, shall store in a protected fashion between the inner liner and the outer shell. The visor shield shall meet the requirements of ANSI/ISEA Z87.1, Standard for Eye and Face Protection. This certification shall meet NFPA 1971 requirements for heat and impact performance. The visor material shall be a high heat polyarylate. A nose comfort pad shall be provided. The visor shall be optically correct with a scratch resistant coating on the inner and outer surfaces.

The visor shall be deployable by the wearer with a single hand. The visor shall transverse across two axes of movement to accommodate most eye glasses, safety glasses, or other protective eyewear.

No tools shall be required for the wearer to remove the eye shield for cleaning, decontamination, or replacement. Visor must be held in place by retainer latches. Latches must be able to be actuated with the use of a single finger.

Faceshield

The faceshield shall be a hard-coated PPC material 4" x 15" that is molded in the formed position and designed to fit the contour of the helmet brim. The faceshield shall be certified to meet the optic requirements of ANSI/ISEA Z87.1, Standard for Eye and Face Protection. This certification shall meet NFPA 1971 requirements for heat and impact performance.

When mounted, the faceshield shall permit a minimum retractability of 90° in the stowed position.

The faceshield shall be mounted to the brim of the outer shell by a glass-reinforced, flame resistant, nylon handwheel/stainless steel threaded stud attached to a brass T-nut which is supported by an aluminum washer and mounting bracket. The faceshield hardware shall meet the NFPA 1971 Flame Resistance Test. The mounting bracket shall be secured to the brim of the outer shell by the chinstrap screws.

Goggles

The goggle shall be full-perimeter filtered ventilated around the dark-gray molded frame. The lens shall be 2.8mm polycarbonate with anti-fog and anti-scratch coatings. The google shall be certified to meet the optic requirements of ANSI/ISEA Z87.1, Standard for Eye and Face Protection. The goggle strap system shall include a quick adjustment for length/tension that can be used while wearing firefighter gloves. The goggle shall be retained by either a direct connection of two goggle straps that attach to the left and right sides of the inner shell system, or via a full goggle strap that fit around the outer shell

Retro-reflective Trim

The outer shell shall have 8 pentagon-shaped, fluorescent lime-yellow, retro-reflective markings equidistantly located around the circumference of the dome. The reflective materials shall be glass bead based to maximize the resistance to heat exposure experienced in firefighting. Vinyl-based reflective materials will not be considered equal. Options of colors must include lime-yellow and red orange (standard) as well as optional trim in lime-yellow and red-orange and maple leaf.

TrakLite¹

Helmet shall be made available with optional integrated light, Full product specifications of integrated light can be found on our website; https://www.bullard.com/product/traklite

Warranty

Bullard warrants to the original purchaser that the firefighter helmet and non-electronic components are free of defects in materials and workmanship under normal use and service for a period of five (5) years from the date of manufacture on the helmet shell and lifetime (as defined in NFPA 1851: 10 years) warranty on the non-electronic components.

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