



THE STATE OF NEW HAMPSHIRE
DEPARTMENT OF TRANSPORTATION



27

William Cass, P.E.
Commissioner

David Rodrigue, P.E.
Assistant Commissioner
Andre Briere, Colonel, USAF (RET)
Deputy Commissioner

Her Excellency, Governor Kelly A. Ayotte
and the Honorable Council
State House
Concord, New Hampshire 03301

Bureau of Traffic
February 12, 2025

REQUESTED ACTION

The Department of Transportation, Bureau of Traffic, requests authorization to enter into a **sole source** agreement with Applied Research Associates (ARA), Inc. of Albuquerque, NM, Vendor #173099, in the amount of \$23,596. This State Transportation Innovation Council (STIC) grant-funded Workshop/Peer Exchange will provide the opportunity to learn from the developers of the NCHRP Research Report 1070, Tools for Assuring Weigh-in-Motion (WIM) Data Quality. WIM systems are a vital means for collecting traffic data, a critical input for pavement and bridge design, and used for making transportation and freight planning decisions and highway safety investigations. This agreement is effective upon Governor and Council approval through July 31, 2025. 100% Federal Funds.

Funding is contingent upon the availability of funds in FY 2026.

FY 2026

04-96-96-963515-3054
Consolidated Federal Aid
046-500464 Gen Consultants Non-Benefit \$23,596

EXPLANATION

This is a **sole source** request because ARA was contracted to develop the National Cooperative Highway Research Program (NCHRP) 1070 Practical Guide and Tools and as such, is best suited to advise and train staff on this data collection. Final deliverables of this study will focus on enhancing the accuracy of data collected at Weigh-in-Motion (WIM) sites. It will provide NHDOT WIM data collectors and managers with advanced tools and procedures designed to improve the management and ensure the high quality of WIM data.

In 2023, the Transportation Research Board (TRB) completed the NCHRP Project 20-50(20) to develop practical tools and procedures to improve WIM data quality. The goal of the project is to help state highway agencies improve the quality and usability of WIM data. NCHRP contracted with ARA Inc. services to develop the practical WIM guide and supporting tools. The results of this project were recently published in the NCHRP Research Report 1070: Tools for Assuring WIM Data Quality: Practical Guide, and contains instructions on how to use the six (6) WIM spreadsheet tools, which

includes WIM site assessment, sensor selection, installation quality assurance (QA), maintenance, calibration, and data QA analysis tools.

This workshop/peer exchange will provide an opportunity to learn from the developers of the NCHRP WIM tools and guide and will be attended by all six New England states. Presenters from ARA will demonstrate how to operate the NCHRP WIM tools and discuss how these tools can be used to enhance a current WIM program or support a new WIM program. The NCHRP WIM tool developers from ARA also authored the *FHWA WIM Pocket Guide* and developed the national defaults for *Mechanistic-Empirical Pavement Design Guide (MEPDG)* for use with AASHTOWare Pavement ME Design software. ARA presenters will also discuss the benefits of using site-specific WIM data for pavement design vs. default values learned from the FHWA Long-Term Pavement Performance project. It is anticipated that the State will benefit from enhanced accuracy of data collected at WIM sites by providing NHDOT WIM data collectors and managers with advanced tools and operating procedures designed to improve data management and ensure the collection of high-quality WIM data. This workshop will also cover the integration of class data with WIM data needed to make informed pavement design decisions, further ensuring that data application is comprehensive and enhances state-wide pavement maintenance and planning.

Utilizing this integrated approach will help engineers develop robust pavement designs that can accommodate varying traffic loads and optimize the lifespan of road infrastructure. This will result in improvements in right-sizing pavement capacity which will reduce the risk of overbuilding (saving money) or underbuilding (increasing long-term maintenance).

The Department has verified that the necessary funds are available. The contract has been approved by the Attorney General as to form and execution. Copies of the fully executed contract are on file at the Secretary of State's Office and the Department of Administrative Service's Office, and subsequent to Governor and Council approval will be on file at the Department of Transportation.

Your approval of this resolution is respectfully requested.

Sincerely,



William J. Cass, P.E.
Commissioner

WJC/pfc
Attachments

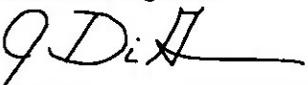
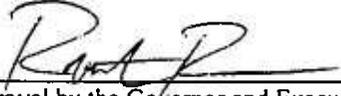
Notice: This agreement and all of its attachments shall become public upon submission to Governor and Executive Council for approval. Any information that is private, confidential or proprietary must be clearly identified to the agency and agreed to in writing prior to signing the contract.

AGREEMENT

The State of New Hampshire and the Contractor hereby mutually agree as follows:

GENERAL PROVISIONS

I. IDENTIFICATION.

1.1 State Agency Name New Hampshire Department of Transportation		1.2 State Agency Address 7 Hazen Drive Concord, NH 03302	
1.3 Contractor Name Applied Research Associates, Inc.		1.4 Contractor Address 4300 San Mateo Boulevard NE SA220 Albuquerque, NM 87110, USA	
1.5 Contractor Phone Number 505-881-8074	1.6 Account Unit and Class 30540000 - 046	1.7 Completion Date 7/31/2025	1.8 Price Limitation \$23,596.00
1.9 Contracting Officer for State Agency Michael O'Donnell, PE		1.10 State Agency Telephone Number 603-272-2292	
1.11 Contractor Signature  Date: 08/12/24		1.12 Name and Title of Contractor Signatory Jennifer Di Gregorio, Vice President, Contracts and Procurement	
1.13 State Agency Signature  Date: 2/24/25		1.14 Name and Title of State Agency Signatory Susan Klase Director of Operations	
1.15 Approval by the N.H. Department of Administration, Division of Personnel (if applicable) By: _____ Director, On: _____			
1.16 Approval by the Attorney General (Form, Substance and Execution) (if applicable) By:  On: February 27, 2025			
1.17 Approval by the Governor and Executive Council (if applicable) G&C Item number: _____ G&C Meeting Date: _____			

2. SERVICES TO BE PERFORMED. The State of New Hampshire, acting through the agency identified in block 1.1 ("State"), engages contractor identified in block 1.3 ("Contractor") to perform, and the Contractor shall perform, the work or sale of goods, or both, identified and more particularly described in the attached EXHIBIT B which is incorporated herein by reference ("Services").

3. EFFECTIVE DATE/COMPLETION OF SERVICES.

3.1 Notwithstanding any provision of this Agreement to the contrary, and subject to the approval of the Governor and Executive Council of the State of New Hampshire, if applicable, this Agreement, and all obligations of the parties hereunder, shall become effective on the date the Governor and Executive Council approve this Agreement, unless no such approval is required, in which case the Agreement shall become effective on the date the Agreement is signed by the State Agency as shown in block 1.13 ("Effective Date").

3.2 If the Contractor commences the Services prior to the Effective Date, all Services performed by the Contractor prior to the Effective Date shall be performed at the sole risk of the Contractor, and in the event that this Agreement does not become effective, the State shall have no liability to the Contractor, including without limitation, any obligation to pay the Contractor for any costs incurred or Services performed.

3.3 Contractor must complete all Services by the Completion Date specified in block 1.7.

4. CONDITIONAL NATURE OF AGREEMENT.

Notwithstanding any provision of this Agreement to the contrary, all obligations of the State hereunder, including, without limitation, the continuance of payments hereunder, are contingent upon the availability and continued appropriation of funds. In no event shall the State be liable for any payments hereunder in excess of such available appropriated funds. In the event of a reduction or termination of appropriated funds by any state or federal legislative or executive action that reduces, eliminates or otherwise modifies the appropriation or availability of funding for this Agreement and the Scope for Services provided in EXHIBIT B, in whole or in part, the State shall have the right to withhold payment until such funds become available, if ever, and shall have the right to reduce or terminate the Services under this Agreement immediately upon giving the Contractor notice of such reduction or termination. The State shall not be required to transfer funds from any other account or source to the Account identified in block 1.6 in the event funds in that Account are reduced or unavailable.

5. CONTRACT PRICE/PRICE LIMITATION/ PAYMENT.

5.1 The contract price, method of payment, and terms of payment are identified and more particularly described in EXHIBIT C which is incorporated herein by reference.

5.2 Notwithstanding any provision in this Agreement to the contrary, and notwithstanding unexpected circumstances, in no event shall the total of all payments authorized, or actually made hereunder, exceed the Price Limitation set forth in block 1.8. The payment by the State of the contract price shall be the only and the complete reimbursement to the Contractor for all expenses, of whatever nature incurred by the Contractor in the performance

hereof, and shall be the only and the complete compensation to the Contractor for the Services.

5.3 The State reserves the right to offset from any amount otherwise payable to the Contractor under this Agreement those liquidated amounts required or permitted by N.H. RSA 80:7 through RSA 80:7-c or any other provision of law.

5.4 The State's liability under this Agreement shall be limited to monetary damages not to exceed the total fees paid. The Contractor agrees that it has an adequate remedy at law for any breach of this Agreement by the State and hereby waives any right to specific performance or other equitable remedies against the State.

6. COMPLIANCE BY CONTRACTOR WITH LAWS AND REGULATIONS/EQUAL EMPLOYMENT OPPORTUNITY.

6.1 In connection with the performance of the Services, the Contractor shall comply with all applicable statutes, laws, regulations, and orders of federal, state, county or municipal authorities which impose any obligation or duty upon the Contractor, including, but not limited to, civil rights and equal employment opportunity laws and the Governor's order on Respect and Civility in the Workplace, Executive order 2020-01. In addition, if this Agreement is funded in any part by monies of the United States, the Contractor shall comply with all federal executive orders, rules, regulations and statutes, and with any rules, regulations and guidelines as the State or the United States issue to implement these regulations. The Contractor shall also comply with all applicable intellectual property laws.

6.2 During the term of this Agreement, the Contractor shall not discriminate against employees or applicants for employment because of age, sex, sexual orientation, race, color, marital status, physical or mental disability, religious creed, national origin, gender identity, or gender expression, and will take affirmative action to prevent such discrimination, unless exempt by state or federal law. The Contractor shall ensure any subcontractors comply with these nondiscrimination requirements.

6.3 No payments or transfers of value by Contractor or its representatives in connection with this Agreement have or shall be made which have the purpose or effect of public or commercial bribery, or acceptance of or acquiescence in extortion, kickbacks, or other unlawful or improper means of obtaining business.

6.4 The Contractor agrees to permit the State or United States access to any of the Contractor's books, records and accounts for the purpose of ascertaining compliance with this Agreement and all rules, regulations and orders pertaining to the covenants, terms and conditions of this Agreement.

7. PERSONNEL.

7.1 The Contractor shall at its own expense provide all personnel necessary to perform the Services. The Contractor warrants that all personnel engaged in the Services shall be qualified to perform the Services, and shall be properly licensed and otherwise authorized to do so under all applicable laws.

7.2 The Contracting Officer specified in block 1.9, or any successor, shall be the State's point of contact pertaining to this Agreement.

8. EVENT OF DEFAULT/REMEDIES.

8.1 Any one or more of the following acts or omissions of the Contractor shall constitute an event of default hereunder ("Event of Default"):

- 8.1.1 failure to perform the Services satisfactorily or on schedule;
- 8.1.2 failure to submit any report required hereunder; and/or
- 8.1.3 failure to perform any other covenant, term or condition of this Agreement.

8.2 Upon the occurrence of any Event of Default, the State may take any one, or more, or all, of the following actions:

- 8.2.1 give the Contractor a written notice specifying the Event of Default and requiring it to be remedied within, in the absence of a greater or lesser specification of time, thirty (30) calendar days from the date of the notice; and if the Event of Default is not timely cured, terminate this Agreement, effective two (2) calendar days after giving the Contractor notice of termination;
- 8.2.2 give the Contractor a written notice specifying the Event of Default and suspending all payments to be made under this Agreement and ordering that the portion of the contract price which would otherwise accrue to the Contractor during the period from the date of such notice until such time as the State determines that the Contractor has cured the Event of Default shall never be paid to the Contractor;
- 8.2.3 give the Contractor a written notice specifying the Event of Default and set off against any other obligations the State may owe to the Contractor any damages the State suffers by reason of any Event of Default; and/or
- 8.2.4 give the Contractor a written notice specifying the Event of Default, treat the Agreement as breached, terminate the Agreement and pursue any of its remedies at law or in equity, or both.

9. TERMINATION.

9.1 Notwithstanding paragraph 8, the State may, at its sole discretion, terminate the Agreement for any reason, in whole or in part, by thirty (30) calendar days written notice to the Contractor that the State is exercising its option to terminate the Agreement.

9.2 In the event of an early termination of this Agreement for any reason other than the completion of the Services, the Contractor shall, at the State's discretion, deliver to the Contracting Officer, not later than fifteen (15) calendar days after the date of termination, a report ("Termination Report") describing in detail all Services performed, and the contract price earned, to and including the date of termination. In addition, at the State's discretion, the Contractor shall, within fifteen (15) calendar days of notice of early termination, develop and submit to the State a transition plan for Services under the Agreement.

10. PROPERTY OWNERSHIP/DISCLOSURE.

10.1 As used in this Agreement, the word "Property" shall mean all data, information and things developed or obtained during the performance of, or acquired or developed by reason of, this Agreement, including, but not limited to, all studies, reports, files, formulae, surveys, maps, charts, sound recordings, video recordings, pictorial reproductions, drawings, analyses, graphic representations, computer programs, computer printouts, notes, letters, memoranda, papers, and documents, all whether finished or unfinished.

10.2 All data and any Property which has been received from the State, or purchased with funds provided for that purpose under this Agreement, shall be the property of the State, and shall be returned to the State upon demand or upon termination of this Agreement for any reason.

10.3 Disclosure of data, information and other records shall be governed by N.H. RSA chapter 91-A and/or other applicable law. Disclosure requires prior written approval of the State.

11. CONTRACTOR'S RELATION TO THE STATE. In the performance of this Agreement the Contractor is in all respects an independent contractor, and is neither an agent nor an employee of the State. Neither the Contractor nor any of its officers, employees, agents or members shall have authority to bind the State or receive any benefits, workers' compensation or other emoluments provided by the State to its employees.

12. ASSIGNMENT/DELEGATION/SUBCONTRACTS.

12.1 Contractor shall provide the State written notice at least fifteen (15) calendar days before any proposed assignment, delegation, or other transfer of any interest in this Agreement. No such assignment, delegation, or other transfer shall be effective without the written consent of the State.

12.2 For purposes of paragraph 12, a Change of Control shall constitute assignment. "Change of Control" means (a) merger, consolidation, or a transaction or series of related transactions in which a third party, together with its affiliates, becomes the direct or indirect owner of fifty percent (50%) or more of the voting shares or similar equity interests, or combined voting power of the Contractor, or (b) the sale of all or substantially all of the assets of the Contractor.

12.3 None of the Services shall be subcontracted by the Contractor without prior written notice and consent of the State.

12.4 The State is entitled to copies of all subcontracts and assignment agreements and shall not be bound by any provisions contained in a subcontract or an assignment agreement to which it is not a party.

13. INDEMNIFICATION. The Contractor shall indemnify, and hold harmless the State, its officers, and employees from and against all actions, claims, damages, demands, judgments, fines, liabilities, losses, and other expenses, including, without limitation, reasonable attorneys' fees, arising out of or relating to this Agreement directly or indirectly arising from death, personal injury, property damage, intellectual property infringement, or other claims asserted against the State, its officers, or employees caused by the acts or omissions of negligence, reckless or willful misconduct, or fraud by the Contractor, its employees, agents, or subcontractors. The State shall not be liable for any costs incurred by the Contractor arising under this paragraph 13. Notwithstanding the foregoing, nothing herein contained shall be deemed to constitute a waiver of the State's sovereign immunity, which immunity is hereby reserved to the State. This covenant in paragraph 13 shall survive the termination of this Agreement.

14. INSURANCE.

14.1 The Contractor shall, at its sole expense, obtain and continuously maintain in force, and shall require any subcontractor or assignee to obtain and maintain in force, the following insurance:

14.1.1 commercial general liability insurance against all claims of bodily injury, death or property damage, in amounts of not less than \$1,000,000 per occurrence and \$2,000,000 aggregate or excess; and

14.1.2 special cause of loss coverage form covering all Property subject to subparagraph 10.2 herein, in an amount not less than 80% of the whole replacement value of the Property.

14.2 The policies described in subparagraph 14.1 herein shall be on policy forms and endorsements approved for use in the State of New Hampshire by the N.H. Department of Insurance, and issued by insurers licensed in the State of New Hampshire.

14.3 The Contractor shall furnish to the Contracting Officer identified in block 1.9, or any successor, a certificate(s) of insurance for all insurance required under this Agreement. At the request of the Contracting Officer, or any successor, the Contractor shall provide certificate(s) of insurance for all renewal(s) of insurance required under this Agreement. The certificate(s) of insurance and any renewals thereof shall be attached and are incorporated herein by reference.

15. WORKERS' COMPENSATION.

15.1 By signing this agreement, the Contractor agrees, certifies and warrants that the Contractor is in compliance with or exempt from, the requirements of N.H. RSA chapter 281-A ("*Workers' Compensation*").

15.2 To the extent the Contractor is subject to the requirements of N.H. RSA chapter 281-A, Contractor shall maintain, and require any subcontractor or assignee to secure and maintain, payment of Workers' Compensation in connection with activities which the person proposes to undertake pursuant to this Agreement. The Contractor shall furnish the Contracting Officer identified in block 1.9, or any successor, proof of Workers' Compensation in the manner described in N.H. RSA chapter 281-A and any applicable renewal(s) thereof, which shall be attached and are incorporated herein by reference. The State shall not be responsible for payment of any Workers' Compensation premiums or for any other claim or benefit for Contractor, or any subcontractor or employee of Contractor, which might arise under applicable State of New Hampshire Workers' Compensation laws in connection with the performance of the Services under this Agreement.

16. WAIVER OF BREACH. A State's failure to enforce its rights with respect to any single or continuing breach of this Agreement shall not act as a waiver of the right of the State to later enforce any such rights or to enforce any other or any subsequent breach.

17. NOTICE. Any notice by a party hereto to the other party shall be deemed to have been duly delivered or given at the time of mailing by certified mail, postage prepaid, in a United States Post Office addressed to the parties at the addresses given in blocks 1.2 and 1.4, herein.

18. AMENDMENT. This Agreement may be amended, waived or discharged only by an instrument in writing signed by the parties hereto and only after approval of such amendment, waiver or discharge by the Governor and Executive Council of the State of New Hampshire unless no such approval is required under the circumstances pursuant to State law, rule or policy.

19. CHOICE OF LAW AND FORUM.

19.1 This Agreement shall be governed, interpreted and construed in accordance with the laws of the State of New Hampshire except where the Federal supremacy clause requires otherwise. The wording used in this Agreement is the wording chosen by the parties to express their mutual intent, and no rule of construction shall be applied against or in favor of any party.

19.2 Any actions arising out of this Agreement, including the breach or alleged breach thereof, may not be submitted to binding arbitration, but must, instead, be brought and maintained in the Merrimack County Superior Court of New Hampshire which shall have exclusive jurisdiction thereof.

20. CONFLICTING TERMS. In the event of a conflict between the terms of this P-37 form (as modified in EXHIBIT A) and any other portion of this Agreement including any attachments thereto, the terms of the P-37 (as modified in EXHIBIT A) shall control.

21. THIRD PARTIES. This Agreement is being entered into for the sole benefit of the parties hereto, and nothing herein, express or implied, is intended to or will confer any legal or equitable right, benefit, or remedy of any nature upon any other person.

22. HEADINGS. The headings throughout the Agreement are for reference purposes only, and the words contained therein shall in no way be held to explain, modify, amplify or aid in the interpretation, construction or meaning of the provisions of this Agreement.

23. SPECIAL PROVISIONS. Additional or modifying provisions set forth in the attached EXHIBIT A are incorporated herein by reference.

24. FURTHER ASSURANCES. The Contractor, along with its agents and affiliates, shall, at its own cost and expense, execute any additional documents and take such further actions as may be reasonably required to carry out the provisions of this Agreement and give effect to the transactions contemplated hereby.

25. SEVERABILITY. In the event any of the provisions of this Agreement are held by a court of competent jurisdiction to be contrary to any state or federal law, the remaining provisions of this Agreement will remain in full force and effect.

26. ENTIRE AGREEMENT. This Agreement, which may be executed in a number of counterparts, each of which shall be deemed an original, constitutes the entire agreement and understanding between the parties, and supersedes all prior agreements and understandings with respect to the subject matter hereof.

Contractor
Initials JD
Date 8/12/24

EXHIBIT A: Special Provision(s)

Request from ARA: Section 13: Please delete “defend”. (Defend was removed from the P37 per approval of Robert Pearce)

The contract is effective upon approval by the Governor and Executive Council.

EXHIBIT B: Services to be performed or provided

ARA, Inc. will provide a two-day onsite workshop/peer exchange hosted by NHDOT to provide WIM data collectors and managers with advanced tools and procedures designed to improve WIM data management and ensure delivery of high-quality WIM data. The workshop/peer exchange will be attended by representatives of NHDOT’s Bureau of Traffic and Bureau of Materials and Research, along with representation from Departments of Transportation from Maine, Vermont, Massachusetts, Connecticut, and Rhode Island.

EXHIBIT C: Budget and Method of Payment

Workshop/Peer Exchange budget:

Development and Preparation	\$9,977.00
On-Site Presentation	\$8,662.00
Peer Exchange report assistance	\$3,555.00
Project Management/Coordination	<u>\$1,402.00</u>
Total contract price:	\$23,596.00

Payment terms: Net 30

State of New Hampshire

Department of State

CERTIFICATE

I, David M. Scanlan, Secretary of State of the State of New Hampshire, do hereby certify that APPLIED RESEARCH ASSOCIATES, INC. is a New Mexico Profit Corporation registered to do business in New Hampshire as APPLIED RESEARCH ASSOCIATES OF NEW MEXICO on July 30, 2007. I further certify that all fees and documents required by the Secretary of State's office have been received and is in good standing as far as this office is concerned; and the attached is a true copy of the list of documents on file in this office.

Business ID: 581869

Certificate Number: 0007026897



IN TESTIMONY WHEREOF,

I hereto set my hand and cause to be affixed
the Seal of the State of New Hampshire,
this 24th day of January A.D. 2025.

A handwritten signature in black ink, appearing to read "David M. Scanlan".

David M. Scanlan
Secretary of State



APPLIED RESEARCH ASSOCIATES, INC.

Certification of Vote / Authority

I, **Michael W. Royer**, hereby certify that I am the duly elected Secretary of Applied Research Associates, Inc. I hereby certify the following is a true copy of a vote taken at a meeting of the Board of Directors, duly called and held on November 16-17, 2023:

RESOLVED, that the Board of Directors adopts the Signature Approval Authority (SAA) document and further resolves that the CEO is authorized to make changes, in the future, to adjust signature authority levels up to the CEO asset purchase level, currently set in the SAA at \$1.5M, as needed based on CEO's judgement, so long as those adjustments are roughly proportionate to revenue growth of the company and/or inflation as given by the Federal Government's Consumer Price Index (CPI). The CEO shall report once/year, to the Board of Directors, a summary of changes made to the SAA.

Therefore, based on the above Board-approved Signature Approval Authority (SAA) document of Applied Research Associates, Inc., the following officers have the authority to obligate Applied Research Associates, Inc. in contractual matters:

Robert H. Sues	Chief Executive Officer
Curt A. Beckemeyer	Deputy Chief Executive Officer/Senior Vice President
Michael W. Royer	Chief Financial Officer/Senior Vice President/Secretary/Treasurer
Eduardo Moas	Sector Manager/Senior Vice President
William L. Ratliff	Sector Manager/Senior Vice President
David A. Timian	Sector Manager/Senior Vice President
William R. Vavrik	Sector Manager/Senior Vice President
John J. Perry	Sector Manager/Vice President
Jennifer Di Gregorio	Vice President, Contracts and Procurement

CERTIFICATION

I HEREBY CERTIFY on this date of August 12, 2024, that the foregoing is a true and correct copy of resolution presented to and adopted by the Board of Directors on November 16-17, 2023, and this resolution has not been amended or repealed and remains in full force and effect. I further certify that the officers listed above currently occupy the positions indicated and that they have full authority to bind the corporation in contractual matters.

Michael W. Royer
Secretary/Treasurer



APPLRES-03

GMILLS

CERTIFICATE OF LIABILITY INSURANCE

DATE (MM/DD/YYYY)

8/9/2024

THIS CERTIFICATE IS ISSUED AS A MATTER OF INFORMATION ONLY AND CONFERS NO RIGHTS UPON THE CERTIFICATE HOLDER. THIS CERTIFICATE DOES NOT AFFIRMATIVELY OR NEGATIVELY AMEND, EXTEND OR ALTER THE COVERAGE AFFORDED BY THE POLICIES BELOW. THIS CERTIFICATE OF INSURANCE DOES NOT CONSTITUTE A CONTRACT BETWEEN THE ISSUING INSURER(S), AUTHORIZED REPRESENTATIVE OR PRODUCER, AND THE CERTIFICATE HOLDER.

IMPORTANT: If the certificate holder is an ADDITIONAL INSURED, the policy(ies) must have ADDITIONAL INSURED provisions or be endorsed. If SUBROGATION IS WAIVED, subject to the terms and conditions of the policy, certain policies may require an endorsement. A statement on this certificate does not confer rights to the certificate holder in lieu of such endorsement(s).

PRODUCER HUB International Insurance Services (SOW) 6565 Americas Parkway Suite 720 Albuquerque, NM 87110	CONTACT NAME: Gabriella Mills
	PHONE (A/C, No, Ext): (575) 941-0316 FAX (A/C, No):
	E-MAIL ADDRESS: Gabriella.Mills@hubinternational.com
INSURER(S) AFFORDING COVERAGE	
INSURER A: Continental Casualty Company	NAIC # 20443
INSURER B: Transportation Insurance Company	20494
INSURER C: The Continental Insurance Company	35289
INSURER D:	
INSURER E:	
INSURER F:	

INSURED
Applied Research Associates, Inc.
4300 San Mateo Blvd NE #B300
Albuquerque, NM 87110

COVERAGES

CERTIFICATE NUMBER:

REVISION NUMBER:

THIS IS TO CERTIFY THAT THE POLICIES OF INSURANCE LISTED BELOW HAVE BEEN ISSUED TO THE INSURED NAMED ABOVE FOR THE POLICY PERIOD INDICATED. NOTWITHSTANDING ANY REQUIREMENT, TERM OR CONDITION OF ANY CONTRACT OR OTHER DOCUMENT WITH RESPECT TO WHICH THIS CERTIFICATE MAY BE ISSUED OR MAY PERTAIN, THE INSURANCE AFFORDED BY THE POLICIES DESCRIBED HEREIN IS SUBJECT TO ALL THE TERMS, EXCLUSIONS AND CONDITIONS OF SUCH POLICIES. LIMITS SHOWN MAY HAVE BEEN REDUCED BY PAID CLAIMS.

INSR LTR	TYPE OF INSURANCE	ADDL INSD	SUBR WVD	POLICY NUMBER	POLICY EFF (MM/DD/YYYY)	POLICY EXP (MM/DD/YYYY)	LIMITS
A	<input checked="" type="checkbox"/> COMMERCIAL GENERAL LIABILITY <input type="checkbox"/> CLAIMS-MADE <input checked="" type="checkbox"/> OCCUR <input checked="" type="checkbox"/> XCU Included GEN'L AGGREGATE LIMIT APPLIES PER: <input type="checkbox"/> POLICY <input checked="" type="checkbox"/> PRO-JECT <input type="checkbox"/> LOC OTHER:	X		4029254172	6/30/2024	6/30/2025	EACH OCCURRENCE \$ 1,000,000 DAMAGE TO RENTED PREMISES (Ea occurrence) \$ 500,000 MED EXP (Any one person) \$ 15,000 PERSONAL & ADV INJURY \$ 1,000,000 GENERAL AGGREGATE \$ 2,000,000 PRODUCTS - COMPOP AGG \$ 2,000,000 Ltd Pollution \$ 1,000,000
	UTOMOBILE LIABILITY <input checked="" type="checkbox"/> ANY AUTO OWNED AUTOS ONLY <input checked="" type="checkbox"/> HIRED AUTOS ONLY <input type="checkbox"/> SCHEDULED AUTOS <input checked="" type="checkbox"/> NON-OWNED AUTOS ONLY	X		BUA 4026349108	6/30/2024	6/30/2025	COMBINED SINGLE LIMIT (Ea accident) \$ 1,000,000 BODILY INJURY (Per person) \$ BODILY INJURY (Per accident) \$ PROPERTY DAMAGE (Per accident) \$
C	<input checked="" type="checkbox"/> UMBRELLA LIAB <input checked="" type="checkbox"/> OCCUR <input type="checkbox"/> EXCESS LIAB <input type="checkbox"/> CLAIMS-MADE DED <input checked="" type="checkbox"/> RETENTION \$ 10,000	X		4024175866	6/30/2024	6/30/2025	EACH OCCURRENCE \$ 10,000,000 AGGREGATE \$ 10,000,000
A	WORKERS COMPENSATION AND EMPLOYERS' LIABILITY ANY PROPRIETOR/PARTNER/EXECUTIVE OFFICER/MEMBER EXCLUDED? (Mandatory in NH) Y/N <input checked="" type="checkbox"/> N If yes, describe under DESCRIPTION OF OPERATIONS below		N/A	WC4026390760	6/30/2024	6/30/2025	<input checked="" type="checkbox"/> PER STATUTE <input type="checkbox"/> OTHER E.L. EACH ACCIDENT \$ 1,000,000 E.L. DISEASE - EA EMPLOYEE \$ 1,000,000 E.L. DISEASE - POLICY LIMIT \$ 1,000,000
A	Professional Liab			4029254172	6/30/2024	6/30/2025	Claim/Aggregate \$ 5,000,000
A	Retro Date 10/23/95			4029254172	6/30/2024	6/30/2025	Aggregate \$ 5,000,000

DESCRIPTION OF OPERATIONS / LOCATIONS / VEHICLES (ACORD 101, Additional Remarks Schedule, may be attached if more space is required)

SEE ATTACHED ACORD 101

CERTIFICATE HOLDER

CANCELLATION

New Hampshire Department of Transportation
18 Smokey Bear Blvd
Concord, NH 03302

SHOULD ANY OF THE ABOVE DESCRIBED POLICIES BE CANCELLED BEFORE THE EXPIRATION DATE THEREOF, NOTICE WILL BE DELIVERED IN ACCORDANCE WITH THE POLICY PROVISIONS.

AUTHORIZED REPRESENTATIVE



ADDITIONAL REMARKS SCHEDULE

POLICY NUMBER SEE PAGE 1		NAMED INSURED Applied Research Associates, Inc. 4300 San Mateo Blvd NE #B300 Albuquerque, NM 87110 Bernalillo
CARRIER SEE PAGE 1	NAIC CODE SEE P 1	
EFFECTIVE DATE: SEE PAGE 1		

ADDITIONAL REMARKS

THIS ADDITIONAL REMARKS FORM IS A SCHEDULE TO ACORD FORM,
FORM NUMBER: ACORD 25 FORM TITLE: Certificate of Liability Insurance

Description of Operations/Locations/Vehicles:

New Hampshire Department of Transportation is included as additional Insured with regard to the General Liability and Auto Liability policies on a primary and non-contributory basis when required by written contract with the Named Insured. Umbrella on a follow form basis that extends coverage over General Liability, Automobile Liability, and Employer's Liability.

Applied Research Associates, Inc.
Dean J. Wolf, Traffic Services Supervisor
PH: 717.975.3550
Fax: 717.975.3557

Cost Item	Task(s)	Project Mgmt/Coordination	Development and Preparation	On-site Presentation	Post Event Final Reporting Assistance	Total
Labor (course development and presentation)		\$ 1,351.00	\$ 9,873.00	\$ 6,520.00	\$ 3,516.00	\$ 21,260.00
Travel				\$ 2,038.00		\$ 2,038.00
ODC (computer, printing, etc.)		\$ 51.00	\$ 104.00	\$ 104.00	\$ 39.00	\$ 298.00
Total(s)		\$ 1,402.00	\$ 9,977.00	\$ 8,662.00	\$ 3,555.00	\$ 23,596.00

Assumptions:

One (1) ARA presenter on-site during 2-day presentation.

2nd/3rd ARA remote presenters for up to combined six (6) hours for Day 2.

ARA will provide handouts for presentations assigned to ARA.

ARA will provide a link to download NCHRP WIM tools and NCHRP Guide for participants to download prior to workshop.

Travel included for one (1) presenter.

ARA will provide inputs for final report to NHDOT for their submittal to FHWA.

**Technology and Innovation Deployment Program (TIDP)
New Hampshire STIC Incentive Application Form**

Project Name: New England Weigh-in Motion Peer Exchange
Agency: New Hampshire Department of Transportation, Bureau of Traffic
Address: 18 Smokey Bear Blvd, Concord, NH 03302
Phone: 603-271-0390
Email: Gordon.S.Thompson@dot.nh.gov
Innovation: NCHRP Project 20-50(20) practical tools and procedures to improve WIM data quality. (Traffic Monitoring Systems, Pavement Design, Law Enforcement)
<p>Description of the Proposed Activity: (Please provide a brief description of the activity/project or initiative that will have a statewide impact to make an innovation a standard practice)</p> <p>In 2023, the Transportation Research Board (TRB) National Cooperative Highway Research Program (NCHRP) completed the NCHRP Project 20-50(20) to develop practical tools and procedures to improve WIM data quality. The goal of the project is to help state highway agencies improve the quality and usability of WIM data. ARA Inc. services were procured by NCHRP to develop the practical WIM guide and supporting tools. The results of this project were recently published in the NCHRP Research Report 1070: Tools for Assuring WIM Data Quality: Practical Guide, which will contain instructions on how to use the six WIM spreadsheet tools (WIM site assessment, sensor selection, installation QA, maintenance, calibration, and data QA analysis tools) (see https://www.trb.org/Main/Blurbs/183078.aspx).</p> <p>This peer exchange will provide an opportunity to learn from the developers of the NCHRP WIM tools and guide. The invited speakers from ARA will demonstrate how to operate the NCHRP WIM tools and discuss how these tools can be used to enhance a current WIM program or support a new WIM program. The NCHRP WIM tool developers from ARA also authored the FHWA WIM Pocket Guide and developed the national defaults for Mechanistic-Empirical Pavement Design Guide (MEPDG) for use with AASHTOWare Pavement ME Design software. They will discuss the benefits of using site-specific WIM data for pavement design vs. default values learned from the FHWA Long-Term Pavement Performance project. ARA will prepare workshop presentation materials using the agenda topics provided under</p> <p>ARA (Peer States) Key Topics for Discussion:</p> <p>Day 1 "WIM Sites"</p> <ul style="list-style-type: none"> • Sponsoring Agency Welcome, Introductions and Workshop Overview (NH DOT) 0.5 hour • Why Collect WIM data? WIM Data Users and WIM Data Applications (FHWA or ARA or Agency Experience) • WIM Equipment Types Overview: Cost/Accuracy/Application Considerations 0.5 hour (ARA) • WIM Site Selection: Criteria, strategic planning, and standard specifications 0.5 hour (ARA) • Equipment Installation QA: Best practices and structured approaches 0.5 hour (ARA) • WIM Calibration: Techniques, challenges, and innovations 0.5 hour (ARA) • Equipment Maintenance and Repair: Strategies and processes for longevity and performance 0.5 hour (ARA) • Afternoon Session: Presentation of NCHRP Tools to support site selection, installation QA, calibration, and maintenance (ARA), Questions and Answers (3 hours) <p>Day 2 "WIM Data"</p> <ul style="list-style-type: none"> • WIM Data QA/QC: Ensuring data accuracy and reliability, data-driven WIM calibration. 0.5 hours (ARA) • NCHRP Tool for WIM Data QA/QC 0.5 hours (ARA) • Use of WIM Data for Pavement Design: Leveraging WIM data for infrastructure development, default vs. site specific traffic loading data (ARA) 1 hour • Software Solutions: Integration, analysis, and reporting tools. 1 hour – Agency Experience Presentation or FHWA TMAS?

- Law Enforcement Applications: Enhancing compliance and safety.1 hour – Agency Experience Presentation? (OR, MD?)
- Afternoon Session: Questions and Answers (optional, for 2-day vs. 1.5-day workshop)
- Closing Remarks (NH DOT, host agency)

FHWA – Jessberger (Peer states)

This section will present detailed findings from the NCHRP study on Weigh-In-Motion (WIM) site functionality and identify gaps in knowledge, particularly around grouping multiple WIM sites for loading factor development. We'll explore several strategies for grouping WIM sites, including by route characteristics, regional load patterns, and specific industry impacts. For instance, in Ohio, coal mining has introduced unique loading patterns, necessitating tailored grouping strategies. Additionally, quarries often exhibit 30% to 40% heavier loads in one direction, challenging the traditional grouping methods outlined in the TMG. The presentation will also cover the integration of class data with WIM data to inform pavement design decisions, ensuring that data application is comprehensive and enhances state-wide pavement maintenance and planning. This integrated approach helps in developing robust pavement designs that accommodate varying traffic loads and optimize the lifespan of road infrastructure. It is essential to address the use of weigh-in-motion (WIM) data and the factoring process associated with it. While the NCHRP study does not cover this aspect, leveraging WIM data is valuable, but optimizing its use across various classification sites—through factoring and other methodologies—is a critical area that DOT agencies need to consider as part of their broader program strategy."

- 1) DOT-wide how many classes and/or WIM sites to have?
- 2) Once you know how many now determine where they will go. (ports, thru routes, specific industry loadings, ...))
- 3) What loading factors will be used and how will the existing and/or new sites be grouped for factoring? Per the TMG there should be 6 WIM sites per loading factor group. Will all these sites be within the DOT borders or will sites be shared with other DOT agencies?
- 4) Leveraging WIM data through factoring and other methodologies

End Product: (Expected Outcomes, Benefits and/or Results)

The final deliverable of this study will focus on enhancing the accuracy of data collected at WIM sites. It will provide NHDOT WIM data collectors and managers with advanced tools and procedures designed to improve the management and ensure the high quality of WIM data.

Proposed Schedule: (Anticipated start date and when will product be delivered)

If approved the peer exchange will be held in 2025 @ Concord N.H.

Champion(s): (Who will be reporting progress to STIC)

Stuart Thompson
Traffic Research Engineer
Bureau of Traffic
New Hampshire Department of Transportation

Estimated Total Cost: \$49,400

Amount of Funds Requested:

\$39,600

Estimated Total Cost/Budget Breakdown: (provide a breakdown of the project cost, how will funds be used and what will they be used for to complete this project)

ARA – Prepare and facilitate the peer exchange – \$23,595.

Sponsoring Peer State attendance – 16k Travel, Lodging, Meals ~ 8 persons

NHDOT – \$9,805, Facilitation, Organization, Training Documentation, Reporting

Source of Other Funds or Sponsors (min. 20% non-federal match required):

Bureau of Traffic staff time to sponsor, prepare, document, and prepare case study of event.

STIC Incentive Program Guidance

DEAN J. WOLF

Traffic Services Supervisor – Applied Research Associates, Inc.

Weigh-in-Motion Subject Matter Expert

EDUCATION

A.S., Electronics Engineering Technology; Pensacola Junior College, Pensacola, FL

PROFESSIONAL AFFILIATIONS

- TRB Highway Traffic Monitoring Committee
- TRB Weigh in Motion Subcommittee – Secretary

OVERVIEW OF EXPERIENCE

Mr. Wolf manages the Traffic Services Group of Applied Research Associates, Inc. (ARA). Mr. Wolf's work experience in Weigh-in-Motion (WIM) spans almost 30 years in the areas of research, system design and integration, installation and repair, and technical training, offering a unique combination of project management and field leadership expertise. Mr. Wolf's experience includes all aspects of Traffic Monitoring equipment, data analysis, and doctrine.

Most notable in Mr. Wolf's resume is his over 15 years of service to the FHWA Long Term Pavement Performance (LTPP) SPS Traffic Pooled Fund study. As Project Manager and On-Site Task Leader for SPS WIM system validations, he has provided task supervision and reporting for the validation of WIM systems at LTPP pavement test sections throughout the United States. He has presented at numerous transportation-related conferences and LTPP Traffic Expert Task Group meetings on various aspects of the SPS WIM validations, including equipment performance and validation procedures.

Most recently, Mr. Wolf provided substantial expertise in the areas of Weigh-in-Motion site assessment, site design, WIM calibration, and WIM data analysis as part of NCHRP 20-50(20). This project provided for the development of practical tools designed to support state and federal agencies in all aspects of the collection of high-quality WIM data and resulted in the publication of NCHRP's Tools for Assuring WIM Data Quality: Practical Guide.

Prior to the NCHRP project, Mr. Wolf co-authored the Weigh-in-Motion Pocket Guide for FHWA, drawing on his 30 years of experience in Weigh-in-Motion and his involvement in the LTPP and other FHWA projects. He has led efforts to calibrate WIM systems for the Wisconsin and Minnesota DOTs and managed the installation and calibration of three weigh-in-motion systems and periodic data analysis for the Central Lands Division of FHWA.

As Subject Matter Expert, Mr. Wolf provided technical expertise to assist Georgia DOT in evaluating for adoption the Mechanistic Empirical Pavement Design Guide (M-E PDG). Tasks included gathering truck axle loading data and the development of a statewide data collection plan; determining WIM and supporting systems hardware and software requirements, including addressing installation, maintenance and operation costs and conducting research for and recommending optimal axle loading data collection plans; balancing data needs in pavement design, cost, and number of collection sites; and types of equipment used in obtaining the data.

Mr. Wolf's contributions to the Traffic Monitoring industry over the past 30 years have proven to be critical for understanding and addressing the factors affecting traffic data quality, applying solutions to complex traffic data collection and data quality problems, and advancing the state of the practice through traffic monitoring community outreach, education, mentoring, guidebook and practical tool development, and WIM and VC program development and implementation.