Buy America Concerns

"Quick Responses" to an e-mail sent to the AASHTO Council on Highways and Streets 6-17-2021

AL:

A lot of cement production is owned by CEMEX from Mexico. Most glass beads come from foreign producers - a single domestic bead manufacturer has great capacity for production, but I am told they have all domestic raw materials under their control, which is why the other bead companies currently use foreign beads. Nationally about 12% of all liquid Asphalt comes from out of country - for northeast states that percentage would be higher. 100% of Asphalt polymer additives (SBS, etc.) are from out of country sources. LOTS of aggregates come from out of country - especially in AL.

DE:

The Department is currently experiencing supply chain issues that have lengthened the lead time for many of the materials we use, including structural steel, steel poles, guardrail, and electronic components. With expansion [of Buy America], we anticipate more issues with steel suppliers, electronic components (most of which are made overseas), and petroleum-based products (such as PVC conduit and other plastics we use) leading to time delays and higher costs. As examples, a statewide overhead sign structure contract has been plagued by availability of the structural steel which is the basis of the work, and large orders of guardrail are only being partially fulfilled by suppliers. Items such as dynamic message signs are currently taking upwards of 9 months from order to delivery, and we expect this to continue or potentially lengthen as other components may fall within the new criteria.

Inclusion of items such as asphalt binder, cement, and aggregates, may be problematic as historically foreign sources of cement have been used locally to manufacture concrete and we would expect both supply and cost concerns if this can only be obtained only though an American source.

Inclusion of items such as pavement markings and reflective glass beads may also pose challenges as we are uncertain that the beads are made by any locally sourced manufacturer.

In summary, we are opposed to adding such vaguely worded language to the Code and have significant concerns with the ramifications of doing such.

FL:

Aggregate: Florida has a limited supply of aggregates suitable for concrete and asphalt. Because of the required friction properties, this is a particular concern for asphalt. Canadian granite is a major supplier for the department's friction courses (up to 20% coming Canada).

Other Materials: The other major concern is how far up the raw materials chain the law will go. All asphalt and concrete <u>mix</u> production used on FDOT projects is domestic. If the law extends upstream to the constituent materials, domestic production is not guaranteed. As an example, the source of crude oil used to make the asphalt cement, used to make the asphalt mix, is not always domestic. The polymer used to modify the asphalt cement, used to make the asphalt mix, may not always be domestic.

These concerns also apply to constituent materials in structural concrete: Cement clinker, fly ash, slag, etc.

In short, imposing the Buy America requirement on an expanded list of materials will impact the cost and delivery of our concrete and asphalt. Establishing exceptions to the Buy America requirement takes federal rule making, a multi-year process. Even if exceptions are granted, the added accounting to verify compliance is onerous.

IA:

We have been following this since becoming aware of it very recently, and for one the asphalt industry is very concerned about the impacts this proposed legislation will have, as most of the binder grades passing low temperature requirements for the northern tier of the country have to be sourced from Canada. These will likely result in cost increases, potential project delays, and perhaps quality and durability issues for asphalt pavements. [Shared NAPA one-pager.]

Many Geotextiles and Geosynthetics (engineering fabrics) are manufactured in China, India, Vietnam, & Canada. Most companies that produce these products are global in nature, so I cannot say which facilities within each company have the ability to produce which products. We may hinder our ability to acquire certain product types if we eliminate foreign manufactured products of this nature.

IN:

INDOT Issues Moving Forward with Proposed Changes to Buy America:

The proposed changes to Buy America will most likely lead to a potential lack of availability of the desired products and force INDOT to move to potentially less desirable products to meet the intent of our contracts. Obviously, this lack of availability can cause cost increases due to DOTs and others needing the same products but now must get them from fewer sources, thus supply vs demand issues. The potential here is that if the extra/increased costs persist the bid prices for contracts could increase in the future due to the potential for increased risk to the contractor.

The changes will also potentially lead to delays in our contracts, which can lead to work being performed in timelines that are less desirable weather wise, timelines that do not meet our needs and can cause delays to upcoming projects, or even timelines that move projects into additional construction seasons. This can potentially add workload and escalation costs to already spread thin contractors and added workload for INDOT inspection personnel as we continue to let our projects for the next construction season.

INDOT Internal Issues Pre-Letting Issues:

INDOT has not had success getting waivers for needed materials for contracts when discovered after lettings. Therefore, reviews need to be performed prior to lettings to find out if materials will be available that meet Buy America and waivers need to be requested before letting if needed. Expanding the program will make the pre-letting process more time consuming and lengthy moving forward. The requirements in the new legislation appear to make it look like the approval process will be lengthier as well, which can potentially delay projects.

INDOT Internal Post Letting Issues:

INDOT is already expending a lot of staff time and effort meeting the documentation needs of the existing Buy America program during and post construction to perform project closeout. This is further compounded by our need to find storage capacity for the documents that are currently required to complete material records post construction. The potential Buy America added scope will increase both staff time and information storage needs.

Material Issues Experienced:

INDOT has experienced issues with obtaining materials that meet Buy America for products such as stainless-steel bollards for trail and sidewalk projects, component parts for water and sewer lines, component parts for MSE walls, but for the most part we have gotten by using the allowable minimum amount as per the delivered cost provision and utilize the products.

For manufactured products it has been very difficult to get manufacturers to give us information on the delivered values for materials that are incorporated but do not meet Buy America for the component materials. We have tried to get this done in the past and we were not very successful in obtaining the component cost information. Therefore, we could not confirm we met the minimum value of delivered products that had components in them that did not meet Buy America requirements. We have in the past had this issue on large generators (fuel tanks), parts for large pumps and on pedestrian lifts required to move individuals with disabilities down and back up ramps at pedestrian tunnels.

We are also already seeing issues with getting polymeric and epoxy resin products, used in polymeric bridge deck overlays, steel painting systems, traffic paints and others, in a timely manner and without added cost requests and this is currently delaying contracts. These shortages would also increase costs if paid, but we have not been allowing cost increases except in extreme circumstances. Although we are seeing requests for extra product costs that can greatly increase the cost of the products themselves, the added costs would not normally increase the overall cost of the project by a significant amount. Cost increases generally cause the biggest problem for sub-contractors, who have a harder time absorbing the higher material costs and hurts their employees who now cannot work because they are waiting for materials so that they can start.

MA:

The proposed changes to the Buy America provisions would be problematic for MassDOT, particularly with regard to liquid asphalt and our ability to maintain our highway paving program. We haven't quantified these potential impacts in terms of dollars and delays, but essentially this is a material supply issue. A large percentage of liquid asphalt used in Massachusetts and other northeastern states comes from Canada and there simply aren't enough suppliers in the region who could serve our needs if our paving contractors could no longer use asphalt imported from Canada.

The Massachusetts Concrete and Aggregate Producers Association (MaCAPA) provided these concerns to us earlier today:

The problem [with the proposed changes to the Buy America Clause] is that a huge percentage of liquid asphalt used in the Northeast comes from Canada and ship brokers from Europe. If the "Buy American" provision in this bill goes into effect, paving for Federal projects would be shut down in the Northeast.

PBF in New Jersey is the only asphalt refiner in the Northeast and they also ship to the Mid-West. My estimate is that the Northeast uses more than 1,500,000 liquid tons of asphalt from foreign suppliers and there is no way any US based refiner can make up that tonnage. There would have to be 3 new refineries built on the East coast to accomplish this - and you can imagine how the permitting for that would be received.

Irving Oil from St. John's is the largest supplier of liquid asphalt in Massachusetts. Shutting them off from the market would be a major supply chain disruption. This doesn't even consider that

almost all the polymers and some additives that we use, would also be excluded, as they are manufactured outside the U.S.

We echo these concerns and believe the proposed changes to the law will create a significant problem in Massachusetts and throughout the northeast. This isn't even a monetary concern...it is a material supply concern. Yes, the cost will go up significantly for asphalt, but more importantly we fear that there will not be enough asphalt available in the northeast to maintain our paving program, which will lead to project delays, contract terminations, deteriorated highways and poor road conditions for travelers. Further, we believe this problem will escalate over time, as there are no apparent short term solutions (other than waiving the Buy America legal requirements).

MI:

In Michigan, we are currently experiencing region-wide shortages, delays, and/or force majeure price increases of the following materials:

- Hot Rolled Steel (HSS Tubing, Angles)
- Epoxy products
- Pavement Markings
- Lumber
- Aluminum Extruded Panels
- Steel Posts
- Rubber

Many of these items are manufactured/fabricated/developed as part of the global supply chain, and when production ramps back up, we still see delays on projects. Should the Buy America requirements be expanded, and the global supply chain removed for many of these items, there could be significant delays and costs to projects, especially considering there are many materials domestic manufacturers no longer have the ability to manufacture and will have to develop the capabilities prior to materials being manufactured, and delivered to projects.

MT:

- 1) We were told 4 years ago officially/unofficially by FHWA that waivers were no longer being approved so don't even apply. The last waiver we received from FHWA was four years ago and it took 2 years to get approved. This was for sweeper equipment.
- 2) The definition of construction materials is very vague and subjective.
- Buy America for steel has been in place for over 20 years and has taken years to implement. Suddenly applying this requirement to other materials will take several years for suppliers and States to implement.
 - a. We are still attempting to train our contracting community on how Buy America applies.
- 4) Being a state bordering another country, several of our materials may come from Canada such as wood, petroleum and aggregate products, just to name a few.
- 5) "Manufactured" for Buy America has been very difficult to interpret and comply with. Now applying this to other construction materials will increase that difficulty.
 - a. Items such as control cabinets for signals is an example that all states are challenged with. There is no reasonable way to certify that all components in the cabinet are Buy America compliant.
 - b. Utility supplies are another area that we are challenged with complying.

- c. Is the plastic coating on the wire compliant, the copper or aluminum wire compliant, and so on.
- 6) Montana currently has one staff member whose primary duty is certifying Buy America compliance. Applying this to all construction materials will increase by at least 3 staff members.

While we support the concept of strengthening the US economy, this will have drastic impacts on an already underfunded transportation system.

Thanks for the chance to comments. We will be preparing official comments and discussing this with our congressional delegates.

SC:

South Carolina is very concerned with the proposed changes to Buy America. We have seen an approximate 30% increase in steel prices since the beginning of the year. Our biggest concern right now is the availability of the wire mesh used in reinforced concrete pipe (RCP). Attached are a couple of emails from our South Carolina RCP suppliers. In addition, we are seeing longer lead times for signal poles, especially mast arms, resulting in project delays. Finally, we have concerns with new products being proposed to add to the Buy America requirement. Most of our QPL sources for Asphalt binder and specialized aggregate (calcined bauxite especially) come from outside the US.

E-mail from supplier regarding shortages, June 15, 2021:

I thought I should let you know about a steel wire reinforcement mesh material shortage that we became aware of a few weeks ago, when we tried to place an order for it, and how that will probably affect SCDOT projects soon if it hasn't already.

For 3 weeks, we've been unable to place an order for any concrete pipe wire reinforcement mesh from any supplier and we have a limited supply of wire reinforcement mesh in stock. At this time, I expect that we will have to stop producing RCP within 5-7 weeks and I can't tell you when we might resume production. We're being told that the small diameter wire rod needed to make the wire reinforcement mesh is unavailable and the future availability of it is uncertain.

We are currently supplying RCP to SCDOT projects and we were recently awarded 2 Lots in the State RCP Maintenance Contract. I regret that we may be unable to meet our contractor's needs on your projects in the very near future.

I'm writing you hoping that SCDOT can reach out to Washington for some help on this important matter. I've contacted the ACPA and CCPPA to make them aware of our situation and asked them for assistance.

In my 42 years at Southeastern, I've never seen this issue come up before. I've seen price increases and periodic delays during periods of high demand, but never such a severe shortage. We have never had to stop running concrete pipe for the lack of wire mesh before.

E-mail from second supplier regarding shortages:

I wanted to reiterate what is happening in the wire mesh industry.

The raw material that the wire mesh is produced from is the Low carbon rod. It is the least cost rod that the rod mills produce. Because of that, the rod mills have been more focused on

making the higher carbon rod that they can sell for a larger margin. They are doing this because their overall production is down. They are also changing over less, so their runs are longer with fewer sizes available. Their actual production is down to 60% capacity.

They also are running larger sizes with longer runs, so the sizes mesh mills would use to make small bore pipe is not available. They can't draw larger sizes down because the tensile strength would be too high and the wire or welds would be too brittle and break.

Their capacity has recently been hampered by 3 events that happened 2 weeks ago (in the same week). One rod mill went down for overhaul, another in TX had a fire and down for 3-6 months, and the mill in CO had an explosion. It is down indefinitely! This can only make our situation worse.

As for the mesh mills, Liberty EWP is running less than capacity. This is due to all the raw material availability and headcount in our mills.

We are doing all we can with the raw material available to us. I don't see this getting any better until the end of the year. This will no doubt cause production and availability issues with small-bore pipe from the pipe producers.

E-mail from third supplier regarding shortages:

In the past we could order rebar and have it on the job site within 2-3 weeks. It is now running about 6 weeks... We also have had a difficult time finding just straight rebar that is not prefabricated. In the past the supply house kept it in stock, but now they have very little if any in stock.

VT:

Vermont is not in favor of this proposal due to the lack of material availability. Specifically, the US doesn't have enough cement manufactures or oil suppliers.

Currently there are small delays for some materials, but it is not impacting our current project schedule. However, this could have a serious effect on project delivery.

WI:

Anticipated Problems:

Anytime we limit competition, the 3 things mentioned below will have increased potential for lack of availability, delays, cost increase. Additionally, our efforts/costs to administer these requirements will increase because additional staff time & resources will be necessary to track & complete any documentation that may be required by FHWA.

Problems from the Past:

Wisconsin DOT NE Region had numerous projects affected during project close-out checking materials to ensure they meet the Buy America Process. (2012: 3 projects / 2013: 1 project / 2014: 2 projects / 2015: 1 project / 2016: 3 projects / 2017: 4 projects / 2018: Already 2 so far.)

Wisconsin DOT NE Region had a bascule lift bridge in the design stage that was scheduled to be let to bid in July 2020. Brakes for lift bridges are made in Germany and many other parts may not be available in the US.

Actual cost of staff time working on tracking down Buy America documentation at project close-out has not been documented but we approximated around 40 hours of staff time per project.

Watermain components – the struggle we have had is that these mfgrs/suppliers do not want to provide information as they claim it is "proprietary."

*Romac Industries only provided a Buy America certification for the final product stating: This letter is to certify that the items listed below are manufactured in the United States and meet the requirements of the following: Buy America Act (Federal Transit Administration Funded Projects – Title 49 USC § 5323(j); 49 CFR Part 661; Buy America Act (Federal Highway Administration Funded Projects – Title 23 USC § 313; 23 CFR Part 635.410). When project staff asked for the mill certs and additional documentation, the response from Romac was: Unfortunately, I won't be able to provide that information in detail – both these items are each comprised of many different components with different raw material origins from a wide range of vendors, most of which is proprietary information. Both items meet the criteria of Buy America with the final manufacturing process taking place in the US; can I ask why he's looking for more specific information than that?

Fine Metallic Screen/Hardware Cloth (used in Wire Face MSE Walls): Spec of approx. opening of ¼" and be made of 0.025" diameter wire. It also needed to be galvanized or stainless steel. There is not a single company that we found that manufactures this in the USA because of the emissions from manufacturing this material. Our project staff spent many hours contacting companies and trying to track down a company that produced this in the USA.

Unspecified State DOT:

Our local chapter of NAPA is expressing concerns about asphalt products in northern states. Many suppliers are in Canada and other refineries in the US don't produce the PG Grades and additives we use in colder climates. [Shared NAPA one-pager.]

Unspecified State DOT:

We expect if these changes go through we will see drastic increase in pricing for our transportation projects. The impacts are broadly going to be felt from supply problems in this way:

- Cement used at our DOT today is coming from Greece, Mexico, Turkey, and Brazil. If that were
 to be required from the US only, you develop a large cascading effect of supply, cost, and delay
 concerns.
- Aggregates have a tangential effect for us. While we use some from India for HFST, Vulcan as an example has a plant in the Bahamas that supplies our state, and soon bringing on Mexico delivery. These hit the southern state markets. Cutting that off again creates the scenario above. Supply from Canada similarly will impact the mid-west.
- Liquid Asphalt Cement is served a lot from Canadian crude, upper mid-west primarily, again cut it off and the demand hits domestic production.
- On smaller projects, the percentage that is allowable for the exception for non-American steel is very small. On bridge rehab projects, things like steel hangers are sometimes not available for American made steel.
- On a recent project, we were exporting American steel to a plant in Mexico to make sound wall panels. Once they came back across it was not considered American steel any more.

- Some of the biggest issues is that sometimes the USA product is not available and there is not a way for exemption.
- For our Highway Emergency Response Operators, the vehicles are eligible as a federal expense, but no American vehicle maker is willing to go through the Buy America rigors so we wait on a waiver.

Unspecified State DOT:

In 2018 we began work on a Pump Station Modernization Project on the interstate system. This included work to replace/upgrade all pumps (submersible and vertical), mixers, generators, heaters, and hoists within our pump station.

- In early 2018 the contractor submitted various pieces of equipment as sources of supply. When asked for documentation as to being 'Buy America' compliant we were told that most of their proposed equipment was made with foreign steel and/or in other countries and therefore was not compliant.
- The contractor spent the next few months looking for any manufacturer who could produce something compliant, they were unable to find anything compliant so in May of 2018 we prepared a waiver request which was sent to FHWA.
- After several months of no response, we learned that there was no movement on any waivers nationwide. By fall of 2018 we decided to move forward by acquiring equipment that had the highest percentage of compliant material.
- The contractor once again contacted all manufacturers to determine the most compliant equipment. We ended up using the manufacturers that were able to produce equipment with the highest amount of compliant materials.

There was over a year of lost time on the active construction project for the investigation and review of the 'Buy America' items (and additional costs). Additionally, without the waiver process we still have no clear process available on how to progress on these projects when there are no US manufacturers of the specialized equipment other than to switching the funding of the entire project (to remove all federal funding).

Unspecified State DOT:

One of our primary concerns is with binder and possibly some polymers/modifiers used in a variety of materials (line markings, certain adhesives, etc.). As for binder, the east coast does not have many refineries that manufacture binder, thus it's coming from elsewhere in the US or from a foreign source, and any impact to the current supply chain could have serious cost/schedule impacts to DOT paving programs. As for other impacts, I am not aware of any special aggregates or cement concerns based on our current sources, but obviously that dynamic changes if the current supply nationwide is disrupted when other DOTs that may have used foreign sourced materials are no longer allowed to do so.