

# SECTION 305 NGEC Executive Board

MINUTES

FEBRUARY 24,  
2017

8:30AM EASTERN

ANNUAL MEETING

|                    |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
|--------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>FACILITATOR</b> | <i>Eric Curtit, Chair, S305 NGEC Executive Board</i>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| <b>ATTENDEES</b>   | <b>Board Members and state participants:</b> Eric Curtit, Eric Curtit also as proxy for Ray Hessinger, NYSDOT, Mario Bergeron, Darrell Smith, Michael Lestingi, Tim Hoeffner, Ron Pate, Paul Worley, Brian Beeler II, Michael Jenkins, Arun Rao, Arun Rao for Amanda Martin, Steve Keck, John Oimoen, Marci Petterson, Allan Paul, Jeremy Lattimer, David Simon, Jennifer Bastian, Jason Biggs <b>Support:</b> Shayne Gill, Strat Cavros, Bryan Hong, Kamasha Hendrickson, Steve Hewitt, Larry Salci, Jeff Gordon, Beth Nachreiner, Nico Lindenau, Dave "Emeritus" Warner, Tammy Krause, Dale Engelhardt, Michael Burshtin, Alison Simon, Joseph Paul, <b>Guest Presenters:</b> Robert Ripperger, Paul Jamieson, Dave Ward <b>Industry members/guests:</b> Matt Ward, Jason Caron, Al Bieber, Josh Coran, Joe Moore, Gil Denton, Dick Bruss, Jack Madden, Kevin Simms, Bob Johnston, Pat Sheeran, Nathan Levinton, Joe Quigley, Steve Morrison, Rodney Mcghee, Dave Ward, Paul Ailchholzer, Christof Schieber, Jack Martinson, Alexander Epstein, Kevin Myles, Steve Orzech, Jr., Jim Coston, Craig McKeen, Chuck Wochele, Martin Bloedt, Joe Gagliardino, Dave Diaz, Michael Latour, Richard Curtis, Kevin Brubaker, James LaRusch, Ross Capon, Tom LaMano, Walt Stringer, Rick Harnish, William Durham, Doug Watt, Ken Briers, Jitendra Tomar |
| <b>ABSENTEES</b>   | <b>Board Members:</b> Ray Hessinger, John Rosacker, Amanda Martin <b>Support:</b> Melissa Shurland, Sal DeAngelo, Vincent Brotski, Patrick Centolanzi                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |

## DECISIONS MADE

**1. Convene Annual Meeting: Eric Curtit, Missouri DOT, NGEC Chair**

After receiving a security briefing from hotel staff, NGEC Chairman Curtit called the 7<sup>th</sup> NGEC Annual Meeting to order.

**Self- Introductions**

Attendees were called upon to introduce themselves and what organization they were representing.

**2. Roll Call –Steve Hewitt, Manager, S305 NGEC Support Services:**

Chairman Curtit asked Steve Hewitt to call the roll of voting members of the NGEC and to confirm the presence of a quorum.

After completing the roll call, Steve Hewitt confirmed that, in accordance with the NGEC By-Laws, the presence of a quorum was confirmed with all but one Board member represented in person or by proxy.

**3. Review Meeting Agenda and contents of the meeting packets– Eric Curtit:**

Eric Curtit reviewed today's meeting agenda, and the meeting packet contents.

**4. Approval of the Minutes from January 31, 2017 – Eric Curtit:**

On a motion by Tim Hoeffner, Michigan DOT, and a second by Darrell Smith, Amtrak, the minutes from the January 31, 2017 Executive Board conference call meeting were approved without exception.

**5. NGEC Chairman's Report – Eric Curtit, Missouri DOT:**

NGEC Chairman Eric Curtit presented the Chairman's Report. In his report, Mr. Curtit provided an overview of the

activities of the NGEC over its first seven years, and a look at the NGEC of today and in the future:

### **NGEC Executive Board Chairman's Report**

#### **PRIIA Section 305 Initial formation January 2010**

- Committee establishment and officers
  - Executive Board – States/Amtrak/FRA
  - Technical Subcommittee
  - Finance Subcommittee
  - Administrative Task Force

#### **Initial Work Plan**

- Develop standardized specifications
  - Industry involvement identified as critical
- Develop ownership and organizational structures
- Develop procurement strategies
- Develop fleet management strategies

#### **Technical Subcommittee**

- Establish level of industry involvement
- Establish interoperability and safety standards
- Develop specifications

#### **Finance Subcommittee**

- Identify Joint Procurement opportunities
- Evaluate funding/procurement strategies
- Prepare initial fleet procurement
- Identify opportunities for procurements

#### **Administrative Task Force**

- Budget issues
- Manage NGEC operations
- Keeper of the By-Laws and Operating Procedures
- Determine protocols
- Determine where and how for NGEC administrative functions

#### **Additional Task Forces and Working Groups established**

- Structure and Finance Task Force (SFTF)
- Joint Procurement Task Force (JPTF)
- Accessibility Policy Group (APG)
- Accessibility Working Group (AWG)
- Specification Review Panels

#### **Structure and Finance Task Force**

- Section 6 work
- Funding and Financing Options
- Examining Future Organizational Structure
- Intercity passenger rail has no state border
- Consolidated efforts within the procuring states
- Updates Provided to the Executive Board

#### **Joint Procurement Task Force**

- Establish/monitor initial multi-state procurement activities
- Ultimately - Activities turned over to the procuring states
- Progress reported to NGENC Board

#### **Accessibility Policy Group**

- Reports to NGENC Executive Board
- Works through policy issues related to Accessibility
- Makes recommendations for Executive Board Approval

#### **Accessibility Working Group**

- Reports to the Technical Subcommittee
- Addresses technical issues related to Accessibility
- Non-updated federal guidance
- Does what is right, not the minimum

#### **Vehicle Specification Review Panels**

- Review Panels established for each Vehicle Specification
- Report to the Executive Board
- Reviews specifications against Specification Requirements Documents
- Reviews and makes recommendations on Document Change Requests to current Specifications as approved by the Technical subcommittee

#### **Vehicle Specifications Adopted**

- Bi-level specification August 2010
- Single level February 2011
- Diesel Electric loco March 2011
- Single level trainset August 2011
- Diesel multiple unit September 2012
- Dual mode loco February 2016

#### **Continued Maintenance and Management of NGENC Specifications**

- Document Management process
- Extremely efficient and decisive
- Handled hundreds of revisions throughout procurements
- Helps ensure the best spec possible constantly evolving/improving
- Meeting standardization all the while

#### **Hired guns**

- NGENC hires contractual expertise as necessary
- Help meet goals effectively and quickly
- Invaluable expertise provided by
- Administrative, too, not just technical

#### **Groups, Groups, and more Groups**

- Working groups
- Task Forces
- Technical Subgroups
- All working together

#### **209+305=514**

- Equipment capital

- Predictability
- Accountability
- Capital program
- Reconciliation
- Began as working group – evolved as a standing subcommittee

#### **Results**

- The NGEC is about Results
- Strong input from states/Amtrak/FRA and rail equipment manufacturing and supply industry
- Volunteer/In kind services/collaboration

#### **Results**

- Continually evolving to be efficient and effective
- Maintain budget and goals
- Maintenance of specs via document control
- Development of pertinent information

#### **Results**

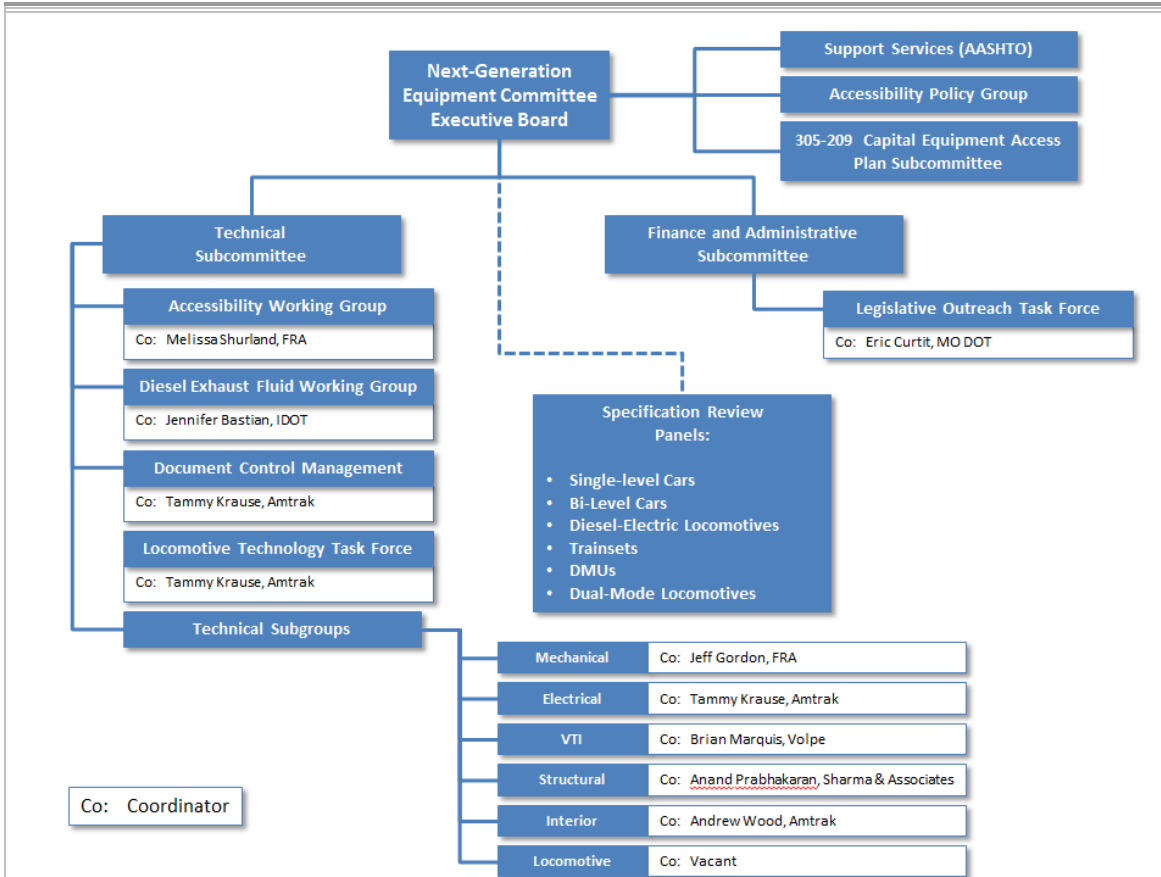
- Specifications
- Support of vehicle production
- Expertise
- Model for innovation
- P3

#### **Other just as important**

- Outreach
- Section 6 work
- Facilitator of discussions
- Too many to mention

#### **Today's NGEC**

- Strategic discussions regarding future
- Time Management – fewer/more efficient meetings – consolidation of efforts
- Establishment of the Finance and Administrative Subcommittee
- Establishment of the 514 Subcommittee



**Today's NGECEB**

- Refined budget and work plan
- New grant: 10-1-17 through 9-30-19
- Revisiting specs to revise/update from productions
- Several procurements using 305 Specs

**NGECEB future**

- Continual maintenance of spec
- Section 6, or lack thereof
- Addressing customer needs
- Continual document control
- Continual improvement

Upon concluding his remarks, Chairman Curtit thanked the industry members for their steadfast involvement in the NGECEB and noted that they are an integral part of the Committee's success. Eric also expressed his appreciation to Amtrak and the FRA as well as the states who give so much of their time, expertise, and energy to make the NGECEB productive and effective. Eric also expressed thanks to NGECEB program manager Steve Hewitt, and the other NGECEB consultants (Larry Salci and Cameron Cordell) who's expertise lends so much to the success of the NGECEB. He also expressed his appreciation to AASHTO staff (Shayne Gill, Strat Cavros, Bryan Hong and Kamasha Hendrickson) for their help and support throughout the year.

**6.**

**Update from the Federal Railroad Administration: Michael Lestingi, and Beth Nachreiner, FRA:**

Michael Lestingi and Beth Nachreiner, FRA, provided an update from the FRA, while also offering a few comments on the NGECEB and its accomplishments:

Michael Lestingi opened his remarks by quoting Henry Ford "...we tend to overstate what can be done in two

years...and understate what can be done in 10 years..."

Michael went on to emphasize how well the NGEC has done "as it nears the end of its first decade...we have locomotives coming. We have met the Henry Ford challenge to see into the future in an amazing way."

Michael went on to note that testing of the locomotives is occurring, and they are performing very well. The FRA is pleased with the results to date, and looks forward to the continued testing.

Michael went on to "extend FRA's thanks to the NGEC and those involved in the current procurement". The FRA looks forward to the NGEC continuing towards fulfilling the goals that were set out in PRIIA and continued in the FAST Act.

Beth Nachreiner, FRA, provided a brief update/overview of planning requirements that were included in the FAST Act that identify the new accounting structure within Amtrak, and how it is now required to report and plan revenue in its service lines.

The initial framework requires a five-year plan for each asset line: Infrastructure, stations, national asset, corporate equipment, and trains.

Assets from service lines focus on equipment. The first planning report is due 2-15-19. Some of the items to be included in the report to Congress are:

Goals, objectives, investment in existing assets, P&L statements, and an appendix that outlines future needs within fiscal constraints.

Within the NGEC – the 514 subcommittee is in the process of undertaking a major update of the Amtrak Five year CIP and there could be some shifts needed to address these individual Five year plans noted above.

With the Amtrak reorganization, as recently announced, all groups (NGEC, SPRC, SAIPRC, NECC) will be reached out to by Amtrak as it begins to implement its new structure and fulfill its planning requirements.

Michael Lestingi concluded the overview by noting that FRA is "excited about Amtrak's ability to do it", and appreciates the work that will be forthcoming through 514 and the NGEC. He went on to say "it's a new world, with a new level of detail and transparency for all parties including our stakeholders".

Michael explained that he and Beth were providing this status update "here because this is a group that we will be contacting" and it is helpful to provide an overview of what is to occur going forward.

## **7.**

### **Update from Amtrak Government Affairs: Robert Ripperger, Amtrak:**

Robert Ripperger, Amtrak, provided a legislative overview from Amtrak's perspective as well as a summary of the Amtrak reorganization:

Robert reported that "where Amtrak is now, as a company, is in a good place." For Amtrak, with the new CEO on board, this is "our 9<sup>th</sup> administration" and it "invites self-reflection".

Amtrak has enjoyed a record year for ridership and in January, 2017 it experienced a record month for ridership. The company's position is good; the new CEO Wick Moorman comes with a business outlook and some great perspectives.

The three primary strategies he is looking to progress are:

- Improved business
- Modernizing the customer's experience
- Investment programs

Amtrak's needs include an update to its fleet with many parts of the fleet reaching 40 years of age. This presents a big challenge, and, with the potential for an infrastructure bill being discussed by the Administration and Congress, an opportunity to fund and replace some of that aging equipment and infrastructure.

Amtrak will look to Congress and the USDOT as it plans for infrastructure legislation – Amtrak has several projects ready to go if an infrastructure bill happens.

With the Administration having an interest in the legacy program and the President having background as a builder – there is hope that there will be opportunities ahead. It is understood that the new Administration will need to take some

time to “shake things out” and forge a path forward.

The FAST Act was landmark legislation in that, for the first time, Amtrak, and passenger rail, was included in a surface transportation authorization bill. Amazingly, the next authorization of surface transportation comes up very soon.

Discretionary grant programs, such as CRISI, are included in the FAST Act as a part of the annual appropriations process.

As for appropriations – there is currently a Continuing Resolution (CR) which expires on 4-29-17. There has been no decision as to what will happen as that date approaches. The Administration’s budget will be out soon, and will set the tone. Amtrak is waiting to see what happens, but recognizes that it is possible that there could be a full year CR – and if there is “we will cope”.

Overall, Mr. Ripperger stated that he “remains cautiously optimistic” and believes that Amtrak is “well positioned to take advantage of the progress it has made.”

**8. Finance and Administrative Subcommittee Update and NGE C Treasurer’s Report – Darrell Smith, Amtrak:**

Darrell Smith provided a Progress report on the activities of the Finance and Administrative subcommittee (FASC), and gave the NGE C Treasurer’s Report:

**FASC Update:**

**Updating the NGE C By-Laws**

- The most recent revised by-laws were adopted on February 19, 2016.
  - Revisions included updates relating to the FAST act and language for “514”.
- Ray Hessinger, FASC Vice Chair, reviewed the most recent version with the FASC in January.
- No needed revisions are identified. Minor text corrections are recorded for a future update.
- No Board action requested today.

**NGE C Future Activities**

- Began 2016 pursuing three recommendations:
  - Equipment Specification Use Fee
  - Federal Grant
  - PRIIA 209/Membership Fee

**Future Funding Recommendations**

1. Consider a Specification Use Fee as a supplement to funding provided through a continuing federal grant and/or a PRIIA 209 support fee. Narrow the scope of a Specification Use Fee to the following two components:
  - a. Parts Suppliers, being the primary requestors of the specifications, charged a nominal fee to be recommended by the FASC by March 31, 2016.
  - b. Non-NGE C Members using a full specification for purchasing rolling stock charged a significant fee, on the order of \$250,000 per equipment-type specification, mechanics of which are to be recommended by the FASC by March 31, 2016.

**Future Funding Recommendations**

2. Direct the FASC’s Legislative Outreach Task Force to present a complete Congressional Outreach Implementation Plan by March 31, 2016, including draft educational materials for consideration for AASHTO’s production, and specific next steps for members to request continuing NGE C funds.

**Future Funding Recommendations**

3. Present the concept of a new annual PRIIA 209 support fee to the State Amtrak Intercity Passenger Rail Committee (SAIPRC) to determine the level of interest of the Amtrak state funding agencies. If SAIPRC

expresses an interest, then the NGEC will direct either the FASC or a new task force to coordinate with SAIPRC a recommended methodology.

*Also continuing to consider other options.*

**Future Funding Results**

On May 4, 2016, the FASC Presented to the NGEC:

1. Re-evaluate actual NGEC spending at the end of FY2016, and consider filing a no-cost extension of the existing Grant Agreement for three additional years through September 30, 2020, at the NGEC's 2017 Annual Meeting.

**Future Funding Results**

2. Recognize the national interest in maintaining a set of standard intercity passenger rail equipment specifications through the NGEC, therefore re-doubling the NGECs education efforts with federal policymakers and Congress.

**Future Funding Results**

The NGEC Board determined that the other funding options, a Specification User Fee and Membership/PRIIA 209 Support Fee, were not practical or available as the FAST Act revisions removed the option of forming a separate corporation.

**Future Funding Results**

In August, the effort shifted from preparing for a no-cost extension of the existing grant effective 10/1/2017 to obtaining a new grant effective 10/1/2016.

**Treasurer's Report**

- Focus was closing out the NGEC's first federal grant and establishing the new 10/1/2016 – 9/30/2019 grant.

**Spending Through 9/30/2016**

|                       | Executive Board | Technical Sub-committee | Finance & Admin. Sub-committee | "514" Equipment Capital Sub-committee | AASHTO Support Services | TOTAL              |
|-----------------------|-----------------|-------------------------|--------------------------------|---------------------------------------|-------------------------|--------------------|
| Labor                 |                 | \$515,710               | \$193,001                      |                                       | \$449,411               | <b>\$1,158,122</b> |
| Meetings              |                 |                         |                                |                                       | \$69,572                | <b>\$69,572</b>    |
| Travel                |                 |                         | \$6,547                        |                                       | \$130,197               | <b>\$136,744</b>   |
| Professional Services |                 | \$198,406               |                                |                                       | \$1,359,320             | <b>\$1,557,726</b> |
| Financial Review      |                 |                         |                                |                                       |                         | <b>\$0</b>         |
| Conference Calls      |                 |                         |                                |                                       | \$1,218                 | <b>\$1,218</b>     |
| Webinar               |                 |                         |                                |                                       | \$79                    | <b>\$79</b>        |
| Reserve (Contingency) |                 |                         |                                |                                       |                         | <b>\$0</b>         |
| Web Site              |                 |                         |                                |                                       | \$0                     | <b>\$0</b>         |
| <b>TOTAL</b>          | <b>\$0</b>      | <b>\$714,117</b>        | <b>\$199,547</b>               | <b>\$0</b>                            | <b>\$2,009,797</b>      | <b>\$2,923,461</b> |

**Budget (New Grant Statement of Work 10/1/2016)**



|                       | Executive Board | Technical Sub-committee | Finance & Admin Sub-committee | "514" Equipment Capital Sub-committee | AASHTO Support Services | TOTAL              |
|-----------------------|-----------------|-------------------------|-------------------------------|---------------------------------------|-------------------------|--------------------|
| Labor                 |                 | \$72,000                | \$90,000                      |                                       | \$100,000               | <b>\$262,000</b>   |
| Meetings              |                 |                         |                               |                                       | \$90,000                | <b>\$90,000</b>    |
| Travel                | \$0             |                         | \$10,000                      | \$0                                   | \$90,000                | <b>\$100,000</b>   |
| Professional Services | \$0             |                         |                               |                                       | \$682,000               | <b>\$682,000</b>   |
| Financial Review      |                 |                         | \$100,000                     |                                       |                         | <b>\$100,000</b>   |
| Conference Calls      |                 |                         |                               |                                       | \$12,000                | <b>\$12,000</b>    |
| Webinar               |                 |                         |                               |                                       | \$3,000                 | <b>\$3,000</b>     |
| Web Site              |                 |                         |                               |                                       | \$1,000                 | <b>\$1,000</b>     |
| Other                 |                 |                         |                               |                                       |                         | <b>\$0</b>         |
| <b>TOTAL</b>          | <b>\$0</b>      | <b>\$72,000</b>         | <b>\$200,000</b>              | <b>\$0</b>                            | <b>\$978,000</b>        | <b>\$1,250,000</b> |

#### Treasurer's Report

- Last 12 months of expenses, 10/1/2015 – 9/30/2016, were \$427,486.46.
- Amount is \$91,513.54 below the last statement of work for the first grant's annualized revised budget of \$519,000 for FY2015 – FY2017.

#### Treasurer's Report

- New grant from FRA began 10/1/2016.
- Funds are available through 9/30/2019.
- Average annual spend budget is \$416,667.
- *This rate is \$10,820 less than our FY2016 spend.*

#### Thank You!

Darrell Smith  
 NGEC Treasurer  
 Amtrak  
 Director, Service Planning & Costing  
[Darrell.Smith@Amtrak.com](mailto:Darrell.Smith@Amtrak.com)  
 (202) 906-3913

In concluding his presentations, Darrell commented that the new federal grant reporting requirements are more organized than they have been in the past. They set milestones that feed the Statement of Work (SOW) that was filed with the FRA. The format for the report is "nice and logical". The quarterly expenses need to be reported at the end of each quarter, and it is important that AASHTO provide its invoices to Amtrak in an extremely timely fashion.

#### 9.

##### Consideration of Acceptance of the Treasurer's Report – Eric Curtit:

As the Treasurer's Report was concluded, and with no further discussion or questions forthcoming, Chairman Curtit called for a motion to accept the Treasurer's Report as presented:

On a motion by Mike Jenkins, Oregon DOT, and a second by Ron Pate, Washington State DOT, the Treasurer's Report was accepted as presented with no objections or exceptions. The Chair determined that consensus was achieved and the motion was approved.

**10.**

**Progress Report: NGEN Technical Subcommittee – Mario Bergeron, Amtrak – Chairman, NGEN Technical subcommittee:**

Mario Bergeron presented the following progress report on the activities of the NGEN Technical subcommittee:

**Section 305 Technical Subcommittee Progress Report**

**Mario Bergeron, Chair – Dale Engelhardt, Vice Chair:**



**(Union Station – Washington, DC)**

**Presentation Summary**

Purpose and Highlights Since Last Annual Meeting on 2/19/16

- PRIIA 305
- Technical Subcommittee Overview
- Vehicle Specification Timeline
- Specification Creation
- Specification Revision
- Technical Subcommittee Presentations

**PRIIA 305**

**Next Generation Corridor Equipment Pool Committee**

- Amtrak was required to establish the Next Generation Corridor Equipment Pool Committee, comprised of representatives of Amtrak, the Federal Railroad Administration, host freight railroad companies, passenger railroad equipment manufacturers, interested States and other passenger railroad operators.
- The Committee was formed to Design, develop specifications for, and procure standardized next-generation corridor equipment.

**PRIIA 305 Technical Subcommittee**

- Main purpose is to develop specifications as requested by the Executive Board.
- Comprised of representatives from Amtrak, FRA, States, and rail equipment manufacturers and suppliers.
  - 15 states involved; California, Connecticut, Illinois, Iowa, Maine, Michigan, Missouri, New York, North Carolina, Oklahoma, Oregon, Texas, Vermont, Washington and Wisconsin.
  - Over 264 industry volunteer members. Open to anyone from companies/consultants involved in rail.
- Each Specification has a Leader to coordinate the creation process.
- Majority of spec writing done by members of the 6 permanent working groups on a volunteer basis with support from a technical writer.

**Technical Subcommittee Overview**

- Meetings
  - Subcommittee; Alternate Thursdays @ 3:00pm ET
  - Technical Working Groups; As Needed

|                                        |                          |
|----------------------------------------|--------------------------|
| <b>Vehicle Track Interaction (VTI)</b> | <b>Brian Marquis</b>     |
| <b>Structural</b>                      | <b>Anand Prabhakaran</b> |
| <b>Electrical</b>                      | <b>Tammy Krause</b>      |
| <b>Mechanical</b>                      | <b>Jeff Gordon</b>       |
| <b>Interiors</b>                       | <b>Andrew Wood</b>       |
| <b>Propulsion</b>                      | <b>Richard Stegner</b>   |
| <b>Diesel Exhaust Fluid (DEF)</b>      | <b>Jennifer Bastian</b>  |
| <b>Digital Train Line (DTL)</b>        | <b>Tammy Krause</b>      |
| <b>Accessibility</b>                   | <b>Melissa Shurland</b>  |

Overview continued:

See PowerPoint presentation for full organizational chart of the NGEC and its subcommittees and working groups.

Pointed out in this section of the report is the critically important industry participants group which consists of 264 registered members.

#### **Specification Creation Process**

Executive Board:

Determines the need for a specification  
 Requests and approves a Requirements Document

Technical subcommittee:

The specification leader works with the Executive Board on the Requirements Document  
 Approves the Timeline

Technical Working Groups

Permanent Technical Working Groups create the initial draft specification – timeline about 3-4 months

DRAFT Public Comment:

Specs are posted  
 Industry Comments are sent to the working Groups  
 The comments are posted

Technical subcommittee:

Holds a face to face meeting to:  
Discuss comments received  
Incorporate accepted comments  
Vote to accept specs as revised

The Technical subcommittee then provides the specification as approved by the Technical subcommittee to the Executive Board

The Executive Board requests the Review Panel review the specification to assure compliance with the Requirements Document.

Review Panel:  
Reviews the specification to assure compliance with the Requirements Document  
Recommends Executive Board Approval

Executive Board then votes on approval of the specification and the spec, as adopted is posted to the NGEC website.

### **Vehicle Specs: Timelines**

1. Bi-Level:
  1. IR - 8/31/10
  2. Rev C4 - 8/2/16
2. Locomotive:
  1. IR - 3/16/11
  2. Rev A.1 - 12/9/14
3. Single Level:
  1. IR - 2/15/11
  2. Rev A - 11/13/12
4. Trainset:
  1. IR - 8/2/11
  2. Rev A - 12/10/13
5. DMU:
  1. IR - 9/4/12
6. Dual Mode Locomotive
  1. IR - 2/2/16

### **Status of Revisions**

The Bi-level specification is currently on revision C4 and the TWGs processed a total of 243 DCRs to date. The Locomotive specification is on revision A1 and so far, the TWGs have processed 56 DCRs. At present an additional 14 are being addressed and the specification will be updated to version A2.

The TSC just began the undertaking of evaluating the 243 changes made to the bi-level specification to determine which of these changes will apply to the single level, MU and trainset specs. A DCR will be created for every proposed change and for each specification.

### **Locomotive Specification Structure**

**The Locomotive chapters are the same as the cars where they can be.**

1. **Specification Summary**
2. **References and Glossary**
3. **Project Management**
4. **Locomotive Carbody**
5. **Running Gear**
6. **Couplers and Draft Gear**
7. **Brakes**
8. Engineers Cab
9. Locomotive Propulsion System
10. AC Power Dist., Comm and MU
11. **Lighting System**
12. **Locomotive to Train Communication**
13. Head End Power System
14. **Engineers Cab Controls**
15. Fuel System
16. **Materials and Workmanship**

17. **Test Requirements**
18. **Tools, Consumables and Spare Parts**
19. **Shipping Preparations**
20. **Training and Documentation**
21. **Customer Variables**
22. Safety Accessories
23. Environmental Characteristics

**Items in Bold are similar between car and locomotives**

### **Specification Revision**

After the specifications are completed and issued as version IR (Initial Release) the process of updating and revising the specification becomes an issue. This has led us to develop a complete and thorough process for managing change control.

Document Change Request Form (DCR)

- This is the basis for all changes.
- Changes can be proposed by anyone using a DCR.
- Evaluated by the TWG responsible for the section affected.
- Approved by the TWG.
- Approved by the Technical Subcommittee during the regular phone conference and sent to Executive Board for review / approval.

### **Specification Revision (Cont'd)**

- Review Panel evaluates proposed change to verify compliance with requirements document.
- Executive Board approves.

This process can take months because typically the DCRs are processed and a specification is revised after several DCRs have been received.

There is an Urgent DCR process to address issues that may come up during a procurement. This pushes a DCR through the system in less than two weeks.

Sometimes a DCR requires that the Requirements Document be updated before approval.

### **Technical Subcommittee Presentations to Follow this update today include:**

Update on NGEC Accessibility Working Group

- Melissa Shurland – FRA

Passenger ECP Brake Equipment

- Paul Jamieson, PE

Update on the AAR Committee

- Jeff Gordon - FRA

Electronic Systems for Trains of the Future

- Dale Engelhardt – Amtrak

As he concluded his presentation, Mario provided an introduction of the next series of presentations from topics under the auspices of the NGEC Technical subcommittee.

NGEC Technical subcommittee core team members and technical working group team leaders:

Core Team Members are:

Mario Bergeron, Dale Engelhardt, Jeff Gordon, Momo Tamaoki, Charlie Poltenson, Marci Petterson, Jennifer Bastian, Phil Meraz, Troy Hughes, Jason Biggs, Lynn Harris, Michael Burshtin, Andrew Wood, Jeff Schultz, Art Peterson, Sal DeAngelo, Dave Warner, Steve Hewitt, Allan Paul, Tammy Krause, Vincent Brotski, Anand Prabhakaran, Nico Lindenau, Brian Marquis, Devin Rouse, Jay Gilfillan, Jonathan Hines, Melissa Shurland, Curtis McDowell, Larry Salci

Technical Working Group Leaders:

Brian Marquis, Anand Prabhakaran, Tammy Krause, Jeff Gordon, Andrew Wood, and Richard Stegner

Discussion:

Eric Curtit thanked Mario Bergeron and the full Technical subcommittee for its efforts and called it “the meat and potatoes of this organization”.

Following the Technical subcommittee update were reports/ status updates from the various ongoing committees/ working groups/efforts most of which provide monthly activity updates to the Technical subcommittee throughout the year.

**11.  
Accessibility Working Group – Melissa Shurland, FRA:**

Melissa Shurland, FRA was unavailable for today’s Annual Meeting, but provided a presentation to be distributed to NGEC members and posted to the NGEC website. On 2-27-17, Steve Hewitt sent the presentation to the NGEC members and to AASHTO for posting.

**12.  
Overview/Summary Report – ECP – Paul Jamieson, SNC Lavalin:**

**Passenger ECP Brake Equipment**

**Past – Present – Future -Paul E. Jamieson, PE - February 24, 2017**

**Topics**

- What is Passenger ECP?
- NGEC Origins
- APTA Involvement
- Performance Standard Development
- Safety Analysis
- FRA Waiver
- Emulation Service
- Static Testing
- Dynamic Testing
- Revenue Service Demonstration
- Next steps to Completion

**What is Passenger ECP?**

- Existing passenger pneumatic brake technology was developed in the 1950’s
- Diagnostics expected in today’s equipment would be difficult if not impractical to apply
- Technology shall be based on the successful implementation of AAR S4200 ECP
- Compatible to 26C technology





Passenger ECP Technology – NYAB & Wabtec

Photos: Gary Cancavage

### NGEC Origins

- During the initial technical specification development, a replacement for the 26C brake controls with a modern system
- The mechanical group realized that a product performance standard was required but not available
- The following text was placed in the initial technical specification
- 

Amtrak  
Mechanical Department  
Bureau of Rolling Stock Engineering

#### SPECIFICATION

for

PRIIA Bi-Level Passenger Rail Car

PRIIA SPECIFICATION No. 905-001  
AMTRAK SPECIFICATION No. 962

Revision C.1

Release Date: September 20, 2012

Initial Release: Approved Issue Date: August 31, 2010

Approved:  Date:   
 PRIIA Board Member  
 Chief Mechanical Officer  
 Deputy Chief Mechanical Officer - Engineering  
 Originator:   
 Originator: Tammy Lee Kruse

### TS 7.2 Brake - General Requirements

All cars shall be equipped with provision for an electrically controlled pneumatic (ECP) brake system. This provision shall consist of a discrete conduit and wiring per AAR Standard S-4200, and particularly AAR Standard S-4210, for redundant implementation of ECP cable-based system in this Specification. The installation shall include a terminal box at each end of the car (for installation of the inter-car jumper cables), a terminal box at the brake manifold, conduit connecting them, as well as, armored cable wiring. The Contractor shall provide appropriate clearance on brake manifolds and adjacent structure to permit installation, servicing and removal of ECP modules. The Contractor shall provide a wiring diagram showing connections of brake controls with the two car end junction boxes to implement ECP braking.

### APTA Involvement

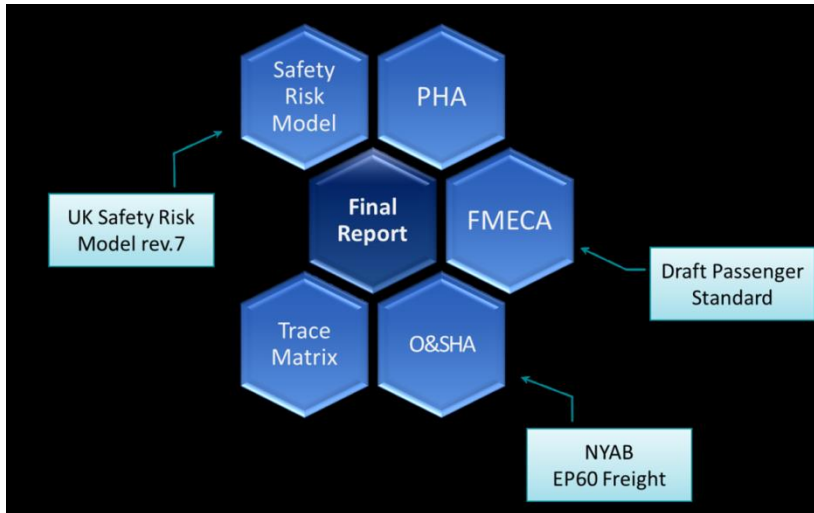
- APTA represents the passenger railroads that are subject to the FRA regulations
- APTA PRESS was established to develop safety standards related to passenger cars and equipment
- APTA was selected to participate in the development of the Passenger ECP Equipment

### Performance Standard Development

- Two APTA PRESS safety standards have been developed
  - ECP Performance (based on AAR S4200 modified for passenger service)
  - Emulation Performance
- These two standards are complimentary to permit ECP equipped cars to operate with existing 26 brake controls and exclusive ECP train configurations

### Safety Analysis

- Performed against the draft APTA Performance Standard
- Funded by an FRA Office of Research and Development grant



### FRA Waiver

- Waiver request was submitted July 14, 2015
- Decision letter was issued February 9, 2016 under docket FRA-2015-0078
- Decision letter confirmed the waiver request with one additional requirement that the train only operate in Amtrak NEC
- Test committee was established consisting of APTA, Amtrak, NGEC members, labor, and other railroads

### Emulation Service

- Four ECP Emulation Amfleet cars have been in revenue service (Keystone service) for 2 and 1/2 years)
- 82610: 400,205 miles since conversion
- 82628: 376,915 miles since conversion
- 82629: 385,037 miles since conversion
- 82637: 400,976 miles since conversion

Through February 5, 2017

- All cars have completed eight 120-Day Preventive Maintenance intervals successfully



### Static Testing



- Interoperability Test
  - Week of September 26, 2016 - NYAB Watertown, NY
  - Demonstrated that the NYAB and Wabtec equipment meet the performance standard requirements and could operate in a train configuration

**Actual Train Testing**

- Week of October 31, 2016 - Amtrak Penn Coach Yard Philadelphia, PA
- Locomotive, coach cars & cab cars commissioned separately and as a train configuration – loco 670; coaches 82610, 82628, 82629 & 82637; and cab car 9644



**Dynamic Testing**

- Testing was conducted on November 4 – 6, 2016 on the NEC near Perrysville, MD
- Testing consisted of stopping distance from various speed and ride quality
- Final reports from the interoperability, static train and dynamic train testing was submitted to the FRA to support the Revenue Service Demonstration



**Revenue Service Demonstration**

- FRA did not take exception to the Revenue Service Demonstration
- The ECP train entered revenue service on Monday, February 6, 2017
- Accumulated mileage until February 20, 2017 – 29,160 fleet miles
- Train will operate in Keystone Service between Harrisburg, PA to New York, NY making one round trip daily
- Train will be operated as complete unit for the ECP equipment continuous maintenance demonstration

**Revenue Service Demonstration**



### **Next Steps to Completion**

- Monitor and report ECP train performance on a bi-annual basis to the FRA
- Develop the maintenance interval for ECP equipment
- Complete the 9 standards required for the ECP equipment including the approval process
- Provide recommendation for 49 CFR 238 updates

### **Acknowledgements**

- Jonathan Bernat – New York Air Brake – Knorr Bremse
- Brenden Crowley – New York Air Brake – Knorr Bremse
- James Dewberry – Wabtec Passenger Transit
- Adam Eby – Amtrak Equipment Engineering
- Jay Gilfillan – Amtrak Assistant System General Road Foreman
- Dr. Mark Hartong – FRA Office of Safety
- Paul Jamieson – SNC-Lavalin Rail & Transit
- Harald Keuerleber – Amtrak Transportation
- Bryan McLaughlin – New York Air Brake – Knorr Bremse

- Danial Rice – Wabtec Railway Electronics
- Lou Sanders - America Public Transportation Association
- Ron Truitt – Amtrak Senior Mechanical Air Brake Engineer
- Steve Zuiderveen – FRA Motive Power and Equipment

**Thank You to Amtrak, APTA, USDOT, NY Air Brake, Wabtec, and SNC-Lavalin**

**13.**

**Overview/Status Report – AAR Committee – Jeff Gordon, FRA:**

**Association of American Railroads (AAR) - Passenger Equipment Performance Specification Status Update – Jeff Gordon, FRA:**

**Purpose**

Develop an AAR Standard approach to address areas of concern including:

- insuring operational safety,
  - reducing risks, and
  - improving operational efficiency
- regarding the introduction and operation of new-design passenger equipment (both passenger cars and passenger locomotives) on freight railroad track, particularly at typical freight railroad speeds (including low speeds).

**Rationale**

A new standard(s) would be beneficial for consistency for Class I Railroad Operations:

- Safety (derailment prevention)
- New equipment waybill moves on revenue freight trains
- New equipment operated by passenger operators on freight lines
- Mitigating network delays and interference with freight ops
- Growth in passenger operations on Class I Railroads
- **Adapting existing standards and requirements to the extent possible**

**AAR’s Primary Motivation**

- Vehicle/track interaction
  - vehicle dynamics
  - derailment potential
- Loss of shunt
- New equipment with unconventional design features:
  - crash energy management
  - push-back couplers (which may not have alignment control)
  - brake systems (including handbrakes)
  - PTC systems

**Organization**

- AAR created Technical Advisory Group (TAG) to develop specification

Participants include:

Caltrans  
 IDOT  
 Michigan DOT  
 FRA  
 APTA  
 Volpe  
 CH2M  
 Siemens  
 Nippon Sharyo  
 STV  
 LTK  
 Interfleet (SNC-Lavalin)  
 Jacobs  
 Curtis Engineering  
 ENSCO  
 Amtrak  
 CSXT

UPRR  
BNSF  
NS  
CN  
KCS  
TTCI  
Iowa-Pacific

### **Major Activities**

- June 4, 2015: Kick-off meeting in DC  
(AAR, Class Is, FRA, Amtrak, JPEs)
- May 27, 2016: TAG web conference
- January 24, 2017: TAG face-to-face meeting in DC
- Periodic conference calls/webcasts

### **Organization of the Specification (1)**

#### **EXISTING DRAFT**

1. Introduction
2. Existing FRA, PRIIA and APTA Standards  
(FTA-AAR compendium of tests performed on passenger vehicles: [www.fta.aar.com](http://www.fta.aar.com))
3. Procedures for Acquiring Route-Specific Track Geometry Data for Design and Evaluation of Passenger Equipment for New Service
4. Roles in Corridor Testing on Class I Railroads

### **Organization of the Specification (2)**

#### **PLANNED/IN-PROCESS**

5. Loss of Shunt Requirements for New Regularly Scheduled Passenger Service
6. Interoperability Requirements – Passenger Equipment on Class I Railroads
7. Interoperability Requirements – Operation of Regularly Scheduled Revenue Passenger Service
8. Vehicle/Track Interaction Requirements

Appendix A: AAR Application Procedures

### **Status (1)**

- Draft of Sections 1-4 distributed to AAR membership July 15, 2016
- No comments received
- TAG reconvened January 24, 2017
  - Review Draft M-1006, Chapters 1-4
  - Discuss proposed content of Chapters 5-8

Updated draft of Chapters 1-4 re-issued for 30-day TAG comment period on January 31, 20

### **Status (2)**

- Chapter 5: LOS – TTCI seeking AAR research funding to explore further – subgroup to be formed to review proposal when complete
- Chapters 6, 7: Focus on compatibility of new passenger equipment with freight ROW/equipment
  - Movement of equipment
  - New regularly-scheduled service

### **Status (3)**

Chapter 8: VTI

- Identifies testing and/or simulations required to demonstrate safe performance on FRA track classes 1 – 5 (up to 90 mph)
  - Any vehicle intended for passenger service
    - In-Transit on freight RR from one location to another
    - Revenue Service operation on a freight RR
  - Identify limiting VTI performance envelope
    - allow unrestricted movement on Freight RRs
    - identify conditions that limit performance and could restrict movements
  - Operation on Track Classes 6 and up covered by FRA 213 Subpart G Track Standards (90 mph and faster)
  - References existing passenger standards where ever possible

**Vehicle/Track System Qualification – Rule effective July 11, 2013**

|                                                 |            | New Vehicle Type                        |           |           |           |           |       |     |     |       |  |
|-------------------------------------------------|------------|-----------------------------------------|-----------|-----------|-----------|-----------|-------|-----|-----|-------|--|
|                                                 |            | Maximum Allowable Operating Speed (mph) |           |           |           |           |       |     |     |       |  |
| Cant Deficiency (in)                            | Eu         | 15<br>10'                               | 30<br>25' | 60<br>40' | 80<br>60' | 90<br>80' | 110   | 125 | 160 | 220   |  |
|                                                 |            | Track Class                             |           |           |           |           |       |     |     |       |  |
|                                                 |            | 1                                       | 2         | 3         | 4         | 5         | 6     | 7   | 8   | 9     |  |
| traditional track geometry limits<br>for Eu ≤ 5 | Eu ≤ 3     | No Testing or Simulations               |           |           |           |           | ●●●●● |     |     | ●●●●● |  |
|                                                 | 3 < Eu ≤ 5 |                                         |           | ●         |           |           | ●●●●● |     |     | ●●●●● |  |
| high-CD track geometry limits<br>for Eu > 5     | 5 < Eu ≤ 6 |                                         |           | ●●        |           |           | ●●●●● |     |     | ●●●●● |  |
|                                                 | Eu > 6     |                                         |           | ●●●●      |           |           |       |     |     | ●●●●● |  |

|                                                 |            | Qualified Vehicle Type                  |           |           |           |           |     |     |     |       |       |
|-------------------------------------------------|------------|-----------------------------------------|-----------|-----------|-----------|-----------|-----|-----|-----|-------|-------|
|                                                 |            | Maximum Allowable Operating Speed (mph) |           |           |           |           |     |     |     |       |       |
| Cant Deficiency (in)                            | Eu         | 15<br>10'                               | 30<br>25' | 60<br>40' | 80<br>60' | 90<br>80' | 110 | 125 | 160 | 220   |       |
|                                                 |            | Track Class                             |           |           |           |           |     |     |     |       |       |
|                                                 |            | 1                                       | 2         | 3         | 4         | 5         | 6   | 7   | 8   | 9     |       |
| traditional track geometry limits<br>for Eu ≤ 5 | Eu ≤ 3     | No Testing or Simulations               |           |           |           |           |     |     |     | ●●    | ●●    |
|                                                 | 3 < Eu ≤ 5 |                                         |           | ●         |           |           |     |     |     | ●●●●● | ●●●●● |
| high-CD track geometry limits<br>for Eu > 5     | 5 < Eu ≤ 6 |                                         |           | ●●        |           |           |     |     |     | ●●●●● | ●●●●● |
|                                                 | Eu > 6     |                                         |           | ●●●●      |           |           |     |     |     | ●●●●● | ●●●●● |

|    |                                                                                          |
|----|------------------------------------------------------------------------------------------|
| ●  | Lean Test (may be met by static or dynamic testing, see sections 213.57(d) & 213.329(d)) |
| ●  | Carbody Accelerometers                                                                   |
| ●● | Wheel-Rail Force Measurement <b>OR</b> Simulation (MCAT & Segment)                       |
| ●● | Wheel-Rail Force Measurement <b>AND</b> Simulation (MCAT & Segment)                      |
| ●  | Truck Accelerometers                                                                     |
| ●  | FRA Notification (see sections 213.57(h) & 213.329(h))                                   |

**Status (4) VTI Subgroup**

- Standard Development Steps to date (January 2017)
  - Reviewed existing FTA, FRA, AAR, APTA, etc. standards
  - Reviewed derailment NTSB, TSB and FRA data bases
  - TTCI participation in APTA PRESS Curving Safety Performance Development
  - TTCI and Volpe Center meetings to identify and discuss proposed contents of standard
  - AAR/TTCI draft of Section 8.0 VTI test and/or simulation analysis requirements for Class 1-5 tracks up to 90 mph
    - Reference other standards where possible
    - Where possible used information from past derailment history
    - Included other common/likely operational conditions
    - Draw on experience in derailment investigation, and vehicle performance analysis & testing of freight and passenger vehicles for acceptance

**Next Steps**

- Collect comments on second draft (Ch 1-4)
- Revise Ch 6, 7 based on input from January 24, 2017 meeting
- TTCI and Volpe to work on revised draft of Chapter 8
- Next TAG meeting: TBD

**Discussion:**

Jeff Gordon responded to a question from Ross Capon, regarding what the significance of 90 mph is if it goes 110 mph?

The reference to 90 mph is meant for vehicles that go less than 90 mph – new vehicles are addressed by existing FRA standards.

Mario Bergeron asked "where do the standards apply to freight equipment as it is commissioned into service as

well?”

Jeff’s response was that “AAR recognizes and is looking at that, and is applying the same standards to freight.”

Asked if AAR is looking at standards for Positive Train Control (PTC) compatibility – Jeff responded that he did not know, but it is not a part of this effort.

**14.  
Electronics on Rolling Stock – Dale Engelhardt, Amtrak:**

As Dale was introduced to make his presentation, Mario Bergeron informed the NGEC Executive Board and all attendees that Dale Engelhardt is planning on retiring in June, so this is likely his last NGEC Annual Meeting. Dale has been an incredible asset, not only to Amtrak, but also to the NGEC, and he will be missed.

**Presentation:**

**Electronic Systems for Trains of the Future**

Utilizing Today’s Available Systems and Planning for Future Advancements - Dale F. Engelhardt

**Overview**

Today’s computers and electronic systems provide numerous methods by which passenger trains can enhance:

*Customer’s Experience*

*Fleet Maintenance/Improved Reliability*

*Transportation Management*

*The following presentation is to provide design concepts for the NGEC to consider and possibly integrate into the NGEC specifications for new rolling stock*

**Agenda**

- **Issues to Consider**
- **Enhanced Customer’s Experience**
- **On-Board Fleet Maintenance Locomotives**
- **On-Board Fleet Maintenance Cars**
- **Transportation Management**
- **Intra Train Communication**
- **Summary**
- **Recommendations**

*Today’s computer manufacturers have agreed on standardized formats so that different suppliers can provide software that will operate of your computer. In addition, standardized format language has been created to allow individual computers to network and connect to the internet and other programs. Electronic devices for rolling stock will need to standardize software configurations so that various devices will successfully communicate with each other. Today most software problems on Amtrak are associated with various suppliers’ devices being able to communicate with each other. Software standardization is key to interchangeability between RR. What agency can be used to promote standardization of software?*

**Issues to Consider**

- Life Cycle
  - Rolling Stock –Planned Approximately 30 Years
  - Electronic Hardware-Upgrades every 3-5 Years
  - Software-Upgrades – variable timelines
- Software
  - Unique to the Application
  - Proprietary Formats
    - Licensing Fees

**Enhanced Customer’s Experience**

- Wi-Fi- High speed connection to the Internet
  - Control Data Streaming?
- Entertainment- movies, TV shows, music to passenger owned devices (on board server to Wi-Fi)
  - Licensing Agreements with Entertainment Providers
- On Board Information Systems – Train status updates

- Location, speed, arrival time, schedule performance
- Train schedule connection opportunities
- An ADA enhancement
- Features of the Future-Unknown

#### **Fleet Maintenance On-Board Status Locos**

- Fault Codes
  - Engine
  - Propulsion
  - Air Compressor
  - Cab Signals
- Equipment/Operational Status Updates
- Ride Quality
- External Cameras
- Internal Cameras
- Engine Idling or on ground power

*Amtrak communicates these faults wirelessly to terminals and stations in advance of locomotive arrival and to a data server to analyze potential fleet failures*

#### **Transportation Management**

- Train Location and Speed
- On Time Performance
- Diesel Fuel Level
- Ticket Processing
- Customer Head Count
- Train Inventory
  - Food
  - Consumables
- Security
  - Internal Facing Cameras

#### **Intra-train Communication**

##### Digital Train Line Communication

- Increased bandwidth
- Standardize cabling and connectors
- Future expansion for safety systems
- Utilize one Wi-Fi/Cellphone connection per train

##### Software

- Standardized format and language (internet approach)
- Open Source Code

To support interchangeability of rolling stock

#### **Summary**

- Electronic/ Computer Systems Are Becoming an Integral Part of Rolling Stock Equipment. Influencing:
  - *Customer's Experience*
  - *Fleet Maintenance*
  - *Transportation Management*
- Planning Required for Life Cycle Differences Between Rolling Stock and Computer Systems
  - Multiple Computer System Upgrades During Life Cycle of Rolling Stock
- Rolling Stock Specifications Need to Include Provisions for Computer System Applications and Inter-Car Communications

#### **Recommendations**

- Create Technical Team to Define Enhancements
  - For Customer's Experience
  - For Fleet Maintenance
  - For Transportation Management
- Interface with IT Organizations
- Edit existing new rolling stock specifications
- Investigate retrofit capabilities

At the end of the presentation, Chairman Curtit expressed his appreciation to Dale, not only for this presentation, but for all that he has meant to the industry, to Amtrak, and to the NGE. "We will miss you Dale...you have always been an incredible 'thinker' – always looking ahead – forward thinking."

**15.**

**514 Subcommittee Update – Brian Beeler II, NNEPRA (for Maine DOT):**

Brian Beeler II, NNEPRA (for Maine DOT) serves as Chair of the 514 Equipment Capital subcommittee. Today, he provided the following update presentation:

In beginning his remarks, Brian expressed his appreciation to Ron Pate, Jason Biggs and Jeremy Jewkes and the Washington State DOT staff who established the foundation for the 514-subcommittee beginning as a working group within the NGE and ultimately becoming a permanent standing subcommittee. Ron and his team developed the charge statement, the initial work plan and the accompanying operating procedures for 514.

**Equipment Capital Subcommittee – (209 + 305 = 514)**

**Accomplishments**

- Completed the 2017-2021 CIP
- Currently working on the 2018-2022 CIP
- This year is considered a "Major Update"
  - Major updates will be done every-other year, or as needed, to incorporate major changes in the implementation of the PRIIA 209 Methodology Policy regarding equipment capital use charges.

**Top Concerns of the Group**

- Improvement to the Reconciliation Process.
- Cost Transparency.
- End of Life Equipment Plan/New equipment coming online.

**Reconciliation Process**

- Improvements to the Reconciliation process
  - Revising budgets when scope change occurs
  - Revising budgets when units completed changes
  - Defining budgets and actuals as per unit prices
  - Tying the quarterly results to State Specific impacts

**Cost Transparency**

- More clearly define the PRIIA 209 statement
  - "The five-year program would include detailed, verifiable program work elements to be accomplished by Amtrak in support of state services annually"
- State of Good Repair (SOGR)
  - SAIPRC has voted to continue the current policy of credits to States for equipment not in SOGR
- Cost Overruns
  - Develop recommendations for a policy to address overhaul work that is over budget

**New State Fleets / End of Life Plans**

- Determine the timelines for new equipment entering State services.
- Identify States' plans for need of Amtrak equipment types that are being replaced.
- Identify Amtrak's plan for the fleet types being replaced.
- Determine the effect to States that continue to use equipment from these equipment types.
- Continue to refine the case for new equipment.

**The Future**

- Given the history, the data available, and the change in the environment since the original creation of PRIIA 209 law, is there an opportunity to update how capital equipment charges are calculated?
- What are the goals/needs for the 514 ECWG?
  - Section 305 NGE



– SAIPRC

During his presentation, Brian expressed special thanks to Mario Bergeron and Darrell Smith, Amtrak, for their efforts and responsiveness.

Brian noted that "Amtrak responsiveness has been great!" Overall, it has been a good process, with Amtrak providing detailed answers to questions posed by the states.

Brian also commented on the fact that Mario, as Amtrak's Chief Mechanical Officer, had extended him a standing invitation to go to the Amtrak facilities in Wilmington/Bear, Delaware "to come see what we do".

Brian took Mario up on the offer and was amazed at the efficiency, professionalism, and tremendous capabilities of the Amtrak employees and the facility itself. Brian noted that "from the ground floor up to Mario, they are detail oriented and dedicated". It was an incredible learning experience.

Brian could not thank Mario, and all involved, enough for their hospitality and the incredible experience he had in spending several days in Wilmington.

Brian stressed that others would do well to experience the tour and the hospitality of Amtrak and to encourage legislators to do the same. "There is no way you can put this into a document when selling it on the Hill or to states".

Ron Pate echoed Brian's sentiments noting that he showed up unannounced some time ago, and was welcomed to a tremendous "hands on" experience. "It made a huge difference".

Mario thanked Brian and Ron for the kind sentiments and added that it is good to come and get a "sense of the complexities of what we do...there is a value to seeing it in Bear..." He invited others to "organize and come see it...we love to show what we do."

Mario also mentioned, regarding the 514 effort, that as time has gone on and the regular calls have evolved there is a "certain rhythm to it." During the initial process, "there was no road map - we had to make it up as you go." Mario added that Ron Pate established the foundation and Brian is now taking it to the next level. Starting the effort was not easy, "we had to lift the hood and understand what is under it...as the process has become more defined - there is a maturity to it."

Mario also expressed his appreciation for the fact that Brian's visit to Wilmington coincided with the CMO senior staff meeting. Brian was willing and able to address the group and "he gave them a states' perspective, and articulated what matters to the states...so, we (Amtrak) got a lot out of his visit as well...it goes both ways." Mario added "the status quo is not an option for us either."

## **16.**

### **Mid-West States – Section 6 Updates – Tim Hoeffner, Michigan DOT:**

Tim Hoeffner, Michigan DOT, gave a brief update on the status of the Mid-West States Section 6 efforts.

Tim thanked his "sister states" from the Mid-West for their hard work and efforts. He specifically thanked IDOT – John Oimoen and Jennifer Bastian, as well as Arun Rao, Wisconsin DOT, for all they have done, and, of course "our Chairman (NGEC) Eric Curtit".

The group has met mostly monthly over the last couple of years.

The fleet manager has been hired by Illinois DOT (lead state for the locomotive procurement).

They have established an oversight board which is the body that the consultant/fleet manager will report to.

The group continues to negotiate with Amtrak on the lease program for the equipment.

They are in the process of developing strategies for entering the equipment into revenue service.

Overall, progress has been made, and they continue to move forward.

## **17.**

### **Progress Report – Diesel Electric Locomotive Multi-State Procurement – John Oimoen, IDOT and Dave Ward, Siemens:**

John Oimoen, IDOT, and Dave Ward, Siemens, provided an overview of the Multi-State Diesel-Electric locomotive

(the Charger) procurement that is progressing well.

John Oimoen opened the presentation with an overview and then turned it over to Mr. Ward who provided a detailed PowerPoint presentation and video of the new "Charger" locomotive.

**NOTE: To view the presentation, which is in PDF format and could not be inserted in these minutes, please go to the NGEC website at [www.ngec305.org](http://www.ngec305.org).**

**Or**

**The presentation has been distributed electronically (2-27-17) by Steve Hewitt, along with other meeting presentations to all NGEC members and should be available that way as well- although some servers would not accept the documents as the files were too large.**

John Oimoen offered the following overview:

"We have made great progress on this incredible journey. We are on the goal line, and just need the final push to get over it."

John expressed appreciation to all the individuals, working groups, subcommittees, and task forces involved and the full NGEC. He also acknowledged the process for developing the specification initially, and for processing Document Change Requests (DCRs) throughout the procurement, all as contributing factors, for the progress made "in reality over a fairly quick period."

John also mentioned that the FRA has been extremely involved and helpful throughout. "They engaged early and often...special thanks to Jeff Gordon (FRA) who has been with us side by side all the way along".

John also acknowledged the JPEs and Ron Pate, WSDOT, and Steve Keck, Caltrans, for their efforts.

"We finally came together very well over the past two years. There has been great cooperation among all parties involved...to the Mid-West states, we are thankful for the trust from our partners." John added that "the process has been collaborative, but we still all represent our own interests".

John also expressed appreciation to Mario Bergeron and DJ Stadler, Amtrak, (as well as Dale Engelhardt) "for keeping things moving along...this procurement is a first for the states in years and years and years and it has been so good to have an experienced operator (Amtrak) working along with us proactively."

John also expressed a special thanks to Siemens for their expertise "from schedule to development to production".

He pointed out that Jennifer Bastian, IDOT, has served as the day to day program manager and has been "vital to driving it from the state side...and you need that."

Dave Ward, Siemens, provided the detailed presentation from the early stages to the present in getting the Charger manufactured, tested and ready for entering service.

Dave mentioned that "having seven partners is more challenging than exciting – it's like having seven mothers-in-law."

The success of the procurement has been the teamwork and transparency throughout the process.

He cited "enterprise scheduling" with a "provision for buffers" as an important factor. "We are holding to the schedule, but it is challenging."

To date, 13 of the Chargers have been delivered. There are more waiting in Sacramento to be delivered. Ten of the Chargers have already achieved the burn test and are waiting and ready to go into service.

Dave explained that from the beginning "Siemens embraced the PRIIA approach to the specifications" and, he added, "it's really seven mothers-in-law plus the NGEC."

Dave added that Siemens was involved in the initial NGEC spec writing, and in the DCR process that keeps the spec current.

Dave also noted "we are tough on our suppliers regarding quality assurance...we do not want our customers having to do the quality assurance...we do it ourselves."

Dave extended his compliments to the PRIIA approach and the NGEC – "it keeps us honest".

He emphasized that it is quite a challenge, and that the openness and transparency, and keeping the spec current takes some effort, but, again, he complimented the NGEC and its processes for making it work.

Discussion:

Asked when the Charger will be in revenue service, John Oimoen responded that there is no firm date, but within 3-4 months would be a reasonable estimate.

Tim Hoeffner commented that he went to Pueblo for some of the testing and was amazed at how quiet the locomotive is. "From neutral to notch eight there is no significant increase in decibels." He added, "it is luxurious".

Mario Bergeron expressed his thanks to John Oimoen and Dave Ward, and their teams – citing that the specs are "nothing if they are not able to turn paper to steel".

Mario added that getting new equipment into service is not easy. He noted that Joe Paul, Amtrak, is the point person, or quarterback, for Amtrak on this and he wanted to "recognize Joe for stepping up". Joe has only been on board with Amtrak for a year or so, and has done a great job serving as the "single point of contact."

Mario also acknowledged Dale Engelhardt "from a technical standpoint" and Tammy Krause as well.

At this point, Ron Pate, WSDOT, expressed his thanks to "Mario and his team...this has not been easy ...state governments are buying equipment to put on host railroad tracks to be operated by Amtrak...not easy, but we are getting there."

#### **18. Comments/Other Issues – All:**

As the floor was open for comments throughout the day, at the end of each presentation, there were no substantive comments offered relative to the NGEC's Agenda for today's meeting.

One question was asked – "What is the status of the Bi-Level Cars procurement?"

The response from the Chair was that the NGEC's role is to address proposed changes to the control documents for each of our specifications. Since currently there is only one vehicle requesting changes that is the only one on the agenda today, and that is the only one we will be addressing.

#### **19. Meeting Summary/Action Items Review – Steve Hewitt:**

Steve Hewitt reviewed several actions/decisions made during the meeting and provided some "housekeeping" announcements.

Decisions:

The Executive Board approved the minutes from the last Executive Board conference call held on 1-31-17.

The Executive Board unanimously accepted the Treasurer's Report as presented.

Comments/housekeeping:

All presentations will be distributed to the NGEC email list and will be posted on the NGEC website at [www.ngec305.org](http://www.ngec305.org)

All state members of the NGEC who have traveled to this meeting are asked to submit their expense reimbursement forms to Strat Cavros, AASHTO, at [scavros@aaashto.org](mailto:scavros@aaashto.org). Please submit these expense forms as soon as possible.

All industry members are asked to review the industry participants roster and provide any corrections, additions, deletions to Steve Hewitt as soon as possible. "The list is only as good as the information provided."

A copy of the sign in sheet for today's meeting will be distributed along with the meeting minutes. All attendees are asked to be sure they have signed in so that the record of attendance is accurate.

The Executive Board call originally scheduled for Tuesday, 2-28-17, is canceled. The next meeting of the NGEC

Executive Board will take place on 3-14-17, resuming its regular schedule.

The NGEN Technical subcommittee will stay on its normal bi-weekly schedule (every other Thursday) with the next call taking place on 3-9-17.

**20.  
Next Steps/Closing Remarks – Eric Curtit:**

Chairman Curtit provided some closing remarks and next steps.

Chairman Curtit talked about the challenges faced by the states through the development of specifications, through the procurement process, and on to getting the equipment into revenue service. He noted that this is not something that states normally encounter since most states do not, historically, own equipment.

Eric stated "we need to have an effort started for developing lessons learned, and expertise gained." He continued, "we need to create, and, not in the specs, a standalone document that is a record of what went on or what we need, as a sort of guidebook for the future...we need to tackle issues that can level the playing field and define what goes into a procurement and getting equipment into revenue service."

Eric added that he is "looking for volunteers to lead this effort, to put this together. It should include industry members as well as states, Amtrak, and FRA."

Ron Pate, WSDOT, and John Oimoen, IDOT, agreed with the Chairman's idea, and volunteered to participate.

John Oimoen elaborated on the challenges enunciated by Chairman Curtit "working together with different priorities, and often with different interpretations of federal rules by states" is a challenge and it is important to work through and develop a guidebook.

Mario Bergeron, Amtrak, also acknowledged the challenges and added "we (Amtrak) will support this effort as well."

Michael Lestingi, FRA, concurred, and added that "FRA will support it with a couple of folks."

Steve Hewitt asked the Chairman to clarify if he was calling for the establishment of a task force to take on these tasks.

Eric confirmed that this was his intent.

Steve Hewitt asked the Chairman what his timeline was for completion.

Eric said that he would like to complete the tasks and have a report ready "by this time next year."

Eric asked for anyone interested in volunteering to serve on the task force to send him (with a cc to Steve Hewitt) an email expressing interest in joining the task force. On the Executive Board call on 3-14-17 Eric will formally establish the task force – name it – and appoint its members.

Steve Hewitt agreed to provide support to the task force.

**21.  
Adjourn:**

With no further business to come before the committee today, Chairman Curtit adjourned the NGEN's 7<sup>th</sup> Annual Meeting at 2:17PM Eastern.

**Decisions and Action Items**

The Executive Board approved the minutes from the last Executive Board conference call held on 1-31-17.

The Executive Board unanimously accepted the Treasurer's Report as presented.

The Chairman announced that he will be establishing a task force to develop "lessons learned" from the first two multi-state procurements. He called for volunteers to participate (Ron Pat, WSDOT, John Oimoen, IDOT, Mario Bergeron – for Amtrak, and Michael Lestingi for FRA all agreed to name representatives to the task force).

Steve Hewitt agreed to provide support.

There will be further details and discussion on the next Board call – 3-14-17.

Interested volunteers should send an email to Eric Curtit and Steve Hewitt expressing interest in participating on the task force.

On the Executive Board call on 3-14-17 Eric will formally establish the task force – name it – and appoint its members.

The timeline for completion of the task force efforts and a report out on the actions taken will be “this time next year” – at the 8<sup>th</sup> NGEN Annual Meeting.

Housekeeping items/actions:

All presentations will be distributed to the NGEN email list and will be posted on the NGEN website at [www.ngec305.org](http://www.ngec305.org)

All state members of the NGEN who have traveled to this meeting are asked to submit their expense reimbursement forms to Strat Cavros, AASHTO, at [scavros@aaasho.org](mailto:scavros@aaasho.org). Please submit these expense forms as soon as possible.

All industry members are asked to review the industry participants roster and provide any corrections, additions, deletions to Steve Hewitt as soon as possible. “The list is only as good as the information provided.”

A copy of the sign in sheet for today’s meeting will be distributed along with the meeting minutes. All attendees are asked to be sure they have signed in so that the record of attendance is accurate.

The Executive Board call originally scheduled for Tuesday, 2-28-17, is canceled. The next meeting of the NGEN Executive Board will take place on 3-14-17, resuming its regular schedule.

The NGEN Technical subcommittee will stay on its normal bi-weekly schedule (every other Thursday) with the next call taking place on 3-9-17.

**Attachment**



**PRIIA Section 305 Next Generation Corridor Equipment Pool Committee (NGEC)  
7th Annual Meeting  
February 24, 2017  
8:30am – 3:00 pm EST  
Hyatt Regency Hotel on Capitol Hill, Washington DC  
Capitol Room**

**Agenda**

- |                |                                                               |
|----------------|---------------------------------------------------------------|
| 8:00 – 8:25am  | Registration (Capitol Room)                                   |
| 8:25 – 8:30 am | Hotel Safety Briefing – Hyatt Regency Hotel Representative    |
| 8:30 – 8:35 am | Convene Annual Meeting: Eric Curtit, Missouri DOT, NGEN Chair |
| 8:35 - 8:45 am | Self introductions                                            |

|                  |                                                                                                  |
|------------------|--------------------------------------------------------------------------------------------------|
| 8:45 – 8:50 am   | Confirm the presence of a quorum: Steve Hewitt, Manager, NGEC Support Services                   |
| 8:50 – 9:00 am   | Review Meeting Agenda: Eric Curtit<br>Review Meeting Packets: Steve Hewitt                       |
| 9:00 – 9:05 am   | Approval of the Minutes from the January 31, 2017 Executive Board conference call                |
| 9:05 – 9:25 am   | NGEC Chairman’s Report: Eric Curtit                                                              |
| 9:25 – 9:40 am   | Update from The Federal Railroad Administration- Michael Lestingi, FRA                           |
| 9:40 – 9:55 am   | Update from Amtrak– Robert Ripperger, Amtrak                                                     |
| 9:55 – 10:10 am  | Break                                                                                            |
| 10:10 – 10:40 am | Finance and Administrative Subcommittee Update & Treasurer’s Report – Darrell Smith, Amtrak      |
| 10:40 – 10:45am  | Consideration of Acceptance of the Treasurer’s Report – Eric Curtit                              |
| 10:45 – 11:15 am | Progress Report: Technical Subcommittee: Mario Bergeron, Amtrak                                  |
| 11:15 – 11:30am  | Overview: Accessibility Report – Melissa Shurland, FRA                                           |
| 11:30- 11:40 am  | Overview/Summary Report – ECP – Paul Jamieson, SNC Lavalin                                       |
| 11:40 – 11:55am  | Overview/Status Report: AAR Committee – Jeff Gordon, FRA                                         |
| 11:55 – 12:05pm  | Electronics on New Rolling Stock – Dale Engelhardt, Amtrak                                       |
| 12:05 – 1:15 pm  | Lunch (on your own)                                                                              |
| 1:15 pm          | Reconvene the meeting – Eric Curtit                                                              |
| 1:15 – 1:30pm    | 514 Subcommittee Update – Brian Beeler II, NNEPRA for Maine DOT                                  |
| 1:30 – 1:45 pm   | Mid-West States – Section 6 Update – Tim Hoeffner, Michigan DOT                                  |
| 1:45 – 2:05pm    | Progress Report: Diesel-Electric Locomotive Procurement: John Oimoen, IDOT<br>Dave Ward, Siemens |
| 2:05 - 2:35 pm   | Questions/Comments/Other Issues: All Attendees                                                   |
| 2:35 – 2:45 pm   | Meeting Summary/Action Items Review: Steve Hewitt                                                |
| 2:45 – 3:00 pm   | Next Steps/Closing Comments: Eric Curtit                                                         |
| 3:00pm           | Adjourn                                                                                          |