I. **Call to Order**

Chair Joslin called the meeting of the BNA Vision Committee to order at 9:00 a.m., pursuant to Public Notice dated November 8, 2019.

II. **Approval of Minutes**

Chair Joslin called for a motion to approve the Minutes of the October 9, 2019 BNA Vision Committee meeting. A motion was made by Commissioner Granbery and seconded by Commissioner Sullivan. The motion carried by vote of 3 to 0.

III. **Chair’s Report**

Chair Joslin stated it had been a busy week and thinks there has been progress made.

IV. **Items for Approval**

A. **Approval of Design Contract for Structural Fill Requirements for Concourse A Ramp Expansion**

Ms. Traci Holton, AVP, Chief Engineer, briefed the Committee on this item. Staff requested that the BNA Vision Committee recommend to the Board of Commissioners that it approve the contract for Design for Structural Fill Requirements for Concourse A Ramp Expansion and authorize the Chair and President and CEO to execute the professional services contract.
Staff provided the BNA Vision Committee a staff analysis of Design Contract for Structural Fill Requirements for Concourse A Ramp Expansion prior to the meeting.

Ms. Holton stated Garver, LLC was selected to provide on-call design services for land development and site preparation projects back in 2016. It is estimated the ramp expansion area will require approximately 600K cubic yards of engineered structural fill for the Concourse A ramp expansion, including evaluation and modeling of the Sims Branch tributaries that will be impacted by this project. The total contract cost is approximately $980K and would take approximately two years to complete.

After questions from the Committee members, President Kreulen stated staff was seeking approval for the design contract only. The two-year contract period included construction services to fill the hole. Staff would bid out the filling of the hole to ensure BNA gets the best deal and bring that back to the Committee and Board for approval at that time.

A motion was made by Commissioner Granbery and seconded by Commissioner Sullivan to recommend to the Board of Commissioners that it approve the contract for Design for Structural Fill Requirements for Concourse A Ramp Expansion and authorize the Chair and President and CEO to execute the professional services contract. The motion carried by vote of 3 to 0.

V. Information Items

A. BNA Vision Program Budget and Schedule Summary

Mr. Robert Ramsey, SVP, Chief Operating Officer briefed the Committee on this item. In September the Board approved an increase to the BNA Vision 1.0 budget to $1.383B. The budget variances shown in previous months have now been rolled into and re-set with the correct budget amounts by project. There is approximately $43M in program contingency and $58M in project contingency.

President Kreulen stated that Ms. Basrai, VP, Chief Financial Officer, received the Moody’s rating for BNA Vision as a whole. Those documents will be sent to the Commissioners. Moody’s reports on the overall program through 2028 which is $2.9B and shows BNA has the financial capacity to move on to the next phase.

Mr. Ramsey stated there is no change to the BNA Vision Program Schedule. Mr. Ramsey pointed out that the completion date of the hotel will be September-December 2023 as reported by Ms. Margaret Martin, VP, Chief Development Officer, at last month’s Board meeting.
B. BNA Vision 2.0 Scope

Mr. Ramsey and President Kreulen briefed the Committee on this item. Staff provided the BNA Vision Committee a staff analysis of BNA Vision 2.0 Scope prior to the meeting. President Kreulen reviewed the challenges and infrastructure needs identified at October’s Board Meeting. He stated he met with the Lt. Governor and the Speaker of the House and they are very active in finding ways to increase state funding to airports. Lt. Governor and Speaker of the House asked that staff come up with long-range plans. Staff will be working on that for the next budget year to be approved by the Governor and the State.

The Board asked the staff to evaluate and present alternatives for moving passengers to Concourse E. Mr. Ramsey and his team have done that and have evaluated alternatives such as a skybridge, automated people mover (APM), tunnel and shuttle. The CEO and CFO had not had the opportunity to review the alternatives but wanted to show the Committee and Board the options at this point and asked for feedback.

Mr. Ramsey stated there were eleven different options evaluated for transporting passengers to a new Concourse E. Staff selected the best option for each of the four connection types. The evaluation criteria included:

1. Net Gain in Gates
2. Capital Cost/Gate
3. 30 Year O&M Cost
4. Schedule for Gate Demand
5. Construction Impact
6. Taxi lane Efficiency for Airlines
7. Passenger Experience
8. Walking Distance

The best option for a skybridge was option 3 — Dual Group III Taxi lanes. The best option for an APM was Option 6 — Elevated. The best option for a tunnel was option 9 — Group III and Group V Taxi lane and shuttling passengers was option 11.

Mr. Ramsey presented option 3 — skybridge dual group III taxi lanes. Capital cost would be approximately $480M. The cost of Concourse E would be approximately $190M while the skybridge
would cost approximately $290M. Working with AECOM, staff concluded there would be a 30-month schedule to build Concourse E and 22 months to build the skybridge. Gates would have to be taken off Concourse C so there would need to be a gate analysis. While the skybridge is being built, passengers would have to ride a shuttle to Concourse E. The travel distance from Concourse C to Concourse E would be approximately 2,300 feet with a walking distance of approximately 2,200 feet.

Mr. Ramsey went on to present option 6 – APM (elevated). This option would be more involved. There would be an elevated people mover transit station at the end of Concourse D to a transit station that would take passengers down into a tunnel under Taxiway T6 to the end of Concourse E. The total estimated capital cost would be $654M. That would include the cost of building Concourse E at $190M and the APM and associated stations at approximately $464M. There would be a 54-month schedule. Travel distance is a bit longer at 4,600 feet and walking distance of approximately 3,000 feet. Commissioner Granbery inquired as to why it was elevated. Mr. Ramsey explained it could not be done at grade because of air freight operations and the central distribution facility.

The next option presented was option 9 – tunnel, group III and V taxi lanes. The tunnel is projected to cost $464M. The schedule would be 30 months to open Concourse E and 28 months for tunnel operations to begin which would require the use of a temporary shuttle. This option would impact gates at both concourses but would net all 8 gates on the new Concourse E. Travel distance is approximately 2,200 feet and walking distance is approximately 2,100 feet.

Option 11 is the shuttle. The capital cost would be $190M to build Concourse E. Assuming a 5-shuttle operation and a sixth to spare, operating costs of shuttles would be just under $2M per year. Travel distance would be 3,800 feet while walking distance would be 950 feet. The shuttle circuit time for a full loop is 18.5 minutes. 18 of 30 large hub airports use shuttles today.

Of the four options presented, the highest scoring options were option 3 and option 11. Two of the 11 options failed. Those were option 4 which was a dual loaded Concourse E which failed due to FAA requirements and option 7 (APM at grade) failed due to significant operational impacts.

Commissioner Granbery stated from just the capital cost, the shuttle would be $27M per gate and the skybridge would be $68M per gate. The other two options would be approximately $81M per gate. He stated he did not think there was any other option than to go with the shuttle option. However, that will impact customer experience. He stated he had been to Tucson, LAX and Atlanta airports and two of the three had shuttles. Commissioner Granbery stated he did not think BNA could justify spending $300M for the skybridge for 8 gates.
After questions and discussions between the Commissioners and staff, Chair Joslin stated the consensus of the Committee was to expedite building expanded Concourse A and possibly offer a bonus to the winning bidder to expedite filling the hole in order to get started on building the expanded Concourse A. As a temporary fix to address the gate shortage until expanded Concourse A can be built, the Committee agreed the most economical solution would be to shuttle passengers to a hard stand instead of building a satellite concourse (also referred to as Concourse E).

President Kreulen thanked the Commissioners for their feedback and stated staff would begin the additional analyses needed as indicated from the discussions at today's meeting and present the findings at the December Committee and Board meetings.

This item was presented for informational purposes only with no action required.

VI. **Adjourn**

There being no further business brought before the BNA Vision Committee, Chair Joslin adjourned the meeting at 10:01 a.m.

Amanda C. Farnsworth, Board Secretary