

**STATE OF NEVADA
SOUTHERN NEVADA STRATEGIC INFRASTRUCTURE
DEVELOPMENT WORKING GROUP
MEETING MINUTES
FEBRUARY 25, 2021**

The meeting of the Southern Nevada Strategic Infrastructure Development Working Group was called to order by Chairman Kristopher Sanchez on the Zoom Platform.

VOTING BOARD MEMBERS PRESENT

Mr. Kris Sanchez, Deputy Director, Governor's Office of Economic Development
Mr. Dave Johnson, Deputy General Manager of Operations, Las Vegas Valley Water District
Ms. Doa Ross, Deputy General Manager of Engineering, Las Vegas Valley Water District
Mr. Jeff Brigger, Director of Business Development, NV Energy
Mr. Justin Brown, Senior VP/General Counsel, Southwest Gas Corp.
Ms. Terri Sheridan, Economic Development Specialist, City of North Las Vegas
Mr. Bill Arent, Deputy Director of Economic and Urban Development, City of Las Vegas
Mr. Raffi Festekjian, Economic Development Coordinator, City of Boulder City
Ms. Myisha Williams, President, MYS Project Management
Ms. Shani Coleman, Directory of Community and Economic Development, Clark County
Ms. Betsy Fretwell, SVP of Switch, Chairwoman of LVGEA
Mr. James Chrisley, Deputy Director of Operations, McCarran International Airport
Mr. Bo Bernhard, Interim Vice President of Economic Development, UNLV
Mr. Victor Wei, Senior Advisor to the President for Strategy & Partnerships, UNLV
Mr. Derrick Hill, Vice President, COX Communications
Ms. MJ Maynard, Chief Executive Officer, Regional Transportation Commission of Southern Nevada
Mr. David Swallow, Deputy Chief Executive Officer, Regional Transportation Commission of Southern Nevada
Dr. Melody Rose, Chancellor, NSHE
Mr. David Bobzien, Director, Nevada Governor's Office of Energy
Ms. Jennifer Taylor, Deputy Director of Intergovernmental Relations, Nevada Governor's Office of Energy
Dr. Federico Zaragoza, President, College of Southern Nevada
Ms. Sondra Rosenberg, Assistant Director of Planning, Nevada Department of Transportation
Ms. Kristina Swallow, Director, Nevada Department of Transportation
Mr. Bradley Crowell, Director, Nevada Department of Conservation and Natural Resources
Mr. Jim Lawrence, Deputy Director, Nevada Department of Conservation and Natural Resources

VOTING BOARD MEMBERS ABSENT AND EXCUSED

Mr. Derek Armstrong, Director of Economic Development and Tourism at City of Henderson

Commissioner Marilyn Kirkpatrick, Clark County, NACO President
Kristina Swallow, Director, Nevada Department of Transportation

STAFF MEMBERS PRESENT

Kristopher Sanchez, Deputy Director, GOED
Melanie Sheldon, Director of Business Development, GOED
Bob Potts, Deputy Director, GOED
Christine Guerci, Special Counsel to the Colorado River Commission and GOED
Greg Bortolin, Director of Communications, GOED
Sonia Joya, Director of Minority and Business Support, GOED
James Humm, Director of Compliance & Regulatory Affairs, GOED
Jeanette Holguin, Business Development Specialist, GOED
Susan Skaggs, Executive Assistant, GOED
Tatjana Vukovic, Director of Business Development, Northern NV, GOED
Carli Smith, Administrative Assistant, GOED

GUESTS PRESENT

Alaina Cowley, LVGEA
Danielle Smith, LVGEA
Gina Gavan
Irene Bustamante Adams, Workforce Connections
Rebecca Wagner
Kristen Averyt, DCNR
Lynn OMara, NNDA
Kim Daniels
Kanani Espinoza
Joseph Campos, BlockChains
Jonathan Daniels
Beth Xie, RTC
Phil Klevorick, Clark County
Chin-Cheng Chen, RTC
Jennifer Atlas
Dan Andersen
Emily Ku, Nevada Department of Business and Industry
Angela Castro, RTC
Dave Johnson, LVVWD
Kristen Averyt, UNLV
Bill Thompson, NDOT
Hubert Hensen, RCG Economics
John Restrepo, RCG Economics
Roland Stephens, SRI Center for Innovation, Strategy and Policy
Norman Anderson, CG/ LA Infrastructure Inc.
Sonny Vinuya, Asian Chamber of Commerce
Russell Rowe

Michael Park
Rita Vaswani, LVICC
Peter Guzman, Latin Chamber of Commerce
Nathan Allen
Ana Wood, Asian Chamber of Commerce
Mike Sullivan, The Ferraro Group
Marcel F. Schaerer, Nevada Department of Business and Industry
Commissioner Kathleen Taylor, Nevada Women Business Center
Cory Hunt, TDC
Roben Armstrong, McCarran International Airport
Derick Hembd
Martin Knauss
Robert Bilbray, Bilbray Industries

1. PUBLIC COMMENT

There was no public comment given.

2. COMMITTEE INTRODUCTIONS

The working group members introduced themselves and gave their titles.

3. OVERVIEW OF THE COMMITTEE CHARGE AND PROPOSED PROCESS

Chairman Kristopher Sanchez thanked all the present organizations for agreeing to participate and explained that GOED has observed the need to reemphasize infrastructure development to address structural deficiencies and respond to the needs of industry in this post COVID-19 world. Chairman Sanchez remarked that GOED has worked with SRI International which produced a report called Nevada's Plan of Recovering Resilience in January. Chairman Sanchez highlighted two recommendations from the report: developing new approaches to cluster identification and development, and the other is integrating Nevada into regional and global value chains. Chairman Sanchez explained this was the reason this working group was assembled to address the following questions on what Southern Nevada's infrastructure assets and deficiencies are, what are the region's opportunities in the Southwest macro region, and to create a niche for Southern Nevada that adds value to the ecosystem while benefiting industry. Chairman Sanchez continued to explain that there are other questions on how to ensure that infrastructure enhancement will benefit our most at-risk communities and small businesses as well as how to eliminate incremental and siloed approaches to infrastructure development in the region and move beyond jurisdictional boundaries. Chairman Sanchez explained that the purpose of this endeavor is to inform GOED as the agency seeks to create an infrastructure roadmap for the region that will diversify our regional economy and respond to the needs of industry while advancing realistic opportunities with proposed timelines and benchmarks that will help Southern Nevadans get back to work.

Chairman Sanchez explained that over the next six months, the group will hear from national experts on these issues and provide time for working group members to engage with the experts and their fellow stakeholders. GOED understands that infrastructure can include educational facilities, health facilities, and much more. The working group will be focusing on core infrastructure such as energy, water, rail networks, and digital information technology infrastructure. Chairman Sanchez informed the members that the working group's goal is to position the region as a destination for private sector investment in targeted 21st century relevant growth. John Restrepo from RCG Economics will serve as the group's technical lead. The chair recognized UNLV and their willingness through several of the departments to provide technical support as well. John Restrepo and his team, and with support of GOED staff and UNLV will be working on a final report and a status of that report will be agendized midway through this process. Chairman Sanchez explained that he had envisioned the working group to last for about six months, recognizing that there may be the desire of the group to hold additional meetings beyond that timeframe, but ultimately would like to keep this within a short runway. Chairman Sanchez explained that the working group has constructed a landing page off the GOED main site and all the materials for the working group meetings will be housed on that site, including presentations, recordings of these meetings, as well as supporting documents. Chairman

Sanchez advised the working group members if they have those types of documents that they would like to share to please send them to Jeanette Holguin or John Restrepo so that they can be posted on the site. Chairman Sanchez informed the members that during the next working group meeting that a proposed list of topics for the following meetings, for consideration by this body, will be provided and that he looks forward to their input.

4. OVERVIEW OF THE OPEN MEETING LAW

Christine Guerci, Special Counsel to GOED, informed the members that she will be functioning as the working group's legal counsel and overseer of open meeting law. Ms. Guerci explained that these meetings will be conducted in accordance with the open meeting law and that they're under the aegis of GOED as well as with a number of state and local government bodies. An agenda will be provided ahead of time to the working group and that as a reminder the working group can only discuss things that are on the agenda. Ms. Guerci advised that if the members should have particular topics that would like to discuss that are not on the agenda, then they must inform Chairman Sanchez or Jeanette Holguin so they can put them on an agenda for the next meeting. Ms. Guerci explained that there will be an opportunity for everyone to make comments at the end of the meeting, those are for comments and not for deliberation or specific discussion on issues. Ms. Guerci reminded the group to recall that public comment is for the public to come and give comment and it is not a way to engage in a dialogue or to deliberate any issues that are brought up during public comment.

Ms. Guerci informed the group that should they have any questions for her during the meeting that they can feel free to send her message on the platform and she will be happy to respond. Ms. Guerci commended the formation of the group and that she looks forward to the process.

5. PRESENTATIONS – FOR INFORMATION ONLY

Mr. Norman Anderson, Chairman and CEO of CG/LA Infrastructure Inc. presented his PowerPoint on National Infrastructure Development and Opportunities for the Region. Mr. Anderson sees this as a decade of disruption similar to what happened 120 years ago with the advent of the internal combustion engine.

Mr. Anderson explained that that there are three forces he will highlight that he believes are dramatic influences over our economy going forward, the first of which is digitization. Mr. Anderson advised that 5G is transformative and compared it to Skynet. The process is creating a machine to machine learning capability, AI, and that at some level it is creating an end to end, a logistics system all across this country. Mr. Anderson explained that what is interesting strategically about where Southern Nevada is, is that it is at the choke point between port of Long Beach, LA, and the rest of the country which will be a huge advantage. Mr. Anderson informed the group that one thing that always happens when you go through these pretty dramatic disruptions is you create opportunities for innovation for driving equity and for driving opportunity. Mr. Anderson explained that what is fascinating about 5G is an explosion in data

not just the performance of assets and that is data that will be available to the public and the private sectors. Mr. Anderson described one project being focused on is seeing if an autonomous speedway for trucks all across the U S can be created by putting 5G posts every thousand yards or so, so driverless trucks can efficiently move across our country. Mr. Anderson explained this is an opportunity for bringing supply chains back to this country from China and a rethink of inland ports if we will be producing decentralized production all around the country.

Mr. Anderson informed the members how dramatic our world is about to change in terms of electrification such as high voltage transmission and vastly increased renewables. Mr. Anderson described working with a company that is bringing a high voltage line from the wind fields of Wyoming to Las Vegas, potentially Los Angeles. Mr. Anderson explained that company is thinking about building the first ultra-high voltage line in the US, or the third one since 1975. Mr. Anderson explained that contactless charging along the highways means you've got to figure out how to electrify your highway which is a whole new set of infrastructure, and then there will be enormous destruction that will happen as we get rid lot of the old infrastructure. Mr. Anderson clarified one of the things to think about is not the threat of this change, but dramatic opportunity, especially for a place that is so well situated like Southern Nevada.

Mr. Anderson explained that his third point in his presentation is that he believes there is a big issue in terms of relying on Washington. Mr. Anderson wants to know how it is possible to spend more of the next generation's money when inflation is coming, when there is a huge pent-up demand, and when new infrastructure is largely private. Electric vehicles are private, driverless vehicles which does not require public investment from Washington. Mr. Anderson explained that in terms of the symmetry, there is \$28 trillion in pension and insurance fund assets that do not invest in infrastructure. Canadian infrastructure pension funds invest up to 16% of their assets in infrastructure. Mr. Anderson explained that the state infrastructure bank should be a tremendous engine for identifying priority projects, structuring those projects, and then bringing in extra revenue or additional revenue. There are many opportunities for bringing money into the system such as the Build America Bureau, local pension funds, foreign pension funds, or selling bonds. A financial model for a billion-dollar highway in Nevada is being build, and a tremendous amount of that revenue comes from nontraditional sources like selling data, such as land value capture. Mr. Anderson advised that we must start to think about the country in terms of an end to end autonomous vehicle matrix, where instead of bringing goods and services from China, heavily polluting in terms of ships and air travel, we are producing locally which are many jobs that you can bring to local economies. It is the state infrastructure banks that identify priority projects, conduct feasibility studies, and then bring resources to those projects. Mr. Anderson suggested to the working group that once they have identified their priority projects then they must think through on how to make those projects attractive.

Mr. Anderson described an article he published recently in Forbes, on the five actions that he'd really like to see the Biden administration take so that so that they convince him that they are serious about infrastructure. Mr. Anderson advised the working group to look at the infrastructure word salad that has come out of this administration and how it is very similar to what happened with Trump and Obama. Mr. Anderson explained that increased infrastructure

investment has been spoken about for a long time and it challenges his imagination how it will be done effectively in a divided Congress. Mr. Anderson explained that that is what is needed is investment in new infrastructure which he believes most of it which comes from the private sector. Mr. Anderson explained it is important for everyone to understand what we need to do in terms of seizing opportunities rather than waiting. Mr. Anderson advised that we are a street divided, a house divided, main street versus wall street, rural versus urban, in almost everything that we do right now but once you have a solid vision and you start to hit milestones along the way towards that vision, then you start to generate trust. This leads to the generation of confidence that not only can we reach the vision, but the people working on that vision, working towards those milestones, are reliable and trustworthy. Mr. Anderson explained he believes there is only a 10% chance of a big infrastructure initiative in Washington and would not advise planning on Washington coming through with a lot of money. Mr. Anderson noted that the state infrastructure bank has a tremendous location and a fourth industrial revolution involves being networked as best as you can be with the rest of the country as well as distributed manufacturing, and intangible leadership.

Mr. Anderson explained the importance of constituents communicating with their representatives in order for them to understand what they need. Mr. Anderson noted that yesterday President Biden signed an executive order on bringing the supply chain home such as computer chips, large capacity batteries, pharmaceuticals, and critical minerals. Mr. Anderson informed the working group that his last point he would like to make is on leadership. There is a temptation to look at this COVID period and believe we are going to get back to normal which will never happen. Mr. Anderson explained we are going to go through a massive disruption because of the fourth industrial revolution and that there are three kinds of leadership that really matter at this time. One kind is disruptive leadership which is for someone to help people see where to go. Mr. Anderson gave the example of Billy Mitchell as a disruptive leader who was previously a General but then got court-martialed in 1924, because he told the public and press that it was a dereliction of duty for Washington not to support aircraft carriers and air power. It was critical what he made happen otherwise there would have been real problems in the second world war. Mr. Anderson informed the working group that disruptive leaders are not delivering bad news, they are delivering news that require people to change dramatically. Mr. Anderson explained that another form of leadership is adaptive leadership because what happens in a period where there is so much change, is that people become nervous. People do not want to be pushed further and do not want to be challenged because they are already handling way too much. Mr. Anderson discussed a survey that was done at CG/LA Infrastructure Inc. where people across the US were asked what they thought about the infrastructure brand. Mr. Anderson explained that 82% said it's either an average or a weak brand. Mr. Anderson explained that in terms of strategic infrastructure, people are being asked to make big investments in the future of your state, and the people who are supposed to make those investments don not necessarily get along with the public sector. There is a huge disconnect between the public and private sector in the US, and a huge disconnect between the public and people building infrastructure that needs to be addressed which needs to be addressed at the beginning of the process. Mr. Anderson informed the working group that his favorite type of leadership is heroic leadership. A political

leader has to be disruptive at some level and adaptive, but what is really interesting is if you can spark something in all the people around you and get them motivated to move forward. Mr. Anderson explained there will be an exciting ride over the next couple of years and the trick is to drive the ship rather than just surviving the storm. Mr. Anderson explains that his message to everyone is that he does not believe Washington solves any problems but the people that are going to solve the problems are you all. Mr. Anderson informed the working group that Washington will play a role but not a decisive role, and it is local heroic leadership that matters at this time.

Bradley Crowell, DCNR, asked Mr. Anderson if he had any insight on how other infrastructure banks have worked around the country compared to what Nevada's structure is for our infrastructure bank.

Mr. Anderson explained that he spent a lot of time looking at banks across the country, focused either on transportation or on water and water resources. Mr. Anderson spoke with Build America Bureau and others involved in this issue, and they explained that we must break down all the silos and figure out how to work together. Mr. Anderson informed the working group that the banks that are most successful, like the one in California, are good at working across all the different boundaries to drive what he believes will be a decade of high productivity. The productivity in this country has declined to less than 1% per year and in 1980, 80% of the infrastructure spent in the country came from the federal government through federal government transfers. Last year it was 30%, and 70% came from the states. Mr. Anderson explained that the weight of responsibility on the states has increased dramatically and the institutional innovation in the states has not kept pace, which is why people get frustrated with a lack of voice and a lack of ability to influence the debate.

Bradley Crowell, DCNR, asked Mr. Anderson if the proposed capitalization amount for the Nevada infrastructure bank, is that sufficient to do what he believes we need to do here, or compared to other states.

Mr. Anderson advised the working group that it is a good start and very robust. The right projects that everybody can agree on must be identified get them going as soon as possible so that will build credibility. Mr. Anderson explained that the fundamental piece of this is building credibility so that people believe you.

Mr. Bill Arent, City of Las Vegas, asked Mr. Norman Anderson how the state, specifically Southern Nevada, can stay ahead of the curve when it comes to electrification.

Mr. Norman Anderson explained that creating a sort of smart city laboratory is one of the things that is missing in the country. Mr. Anderson stated that we do not really have any place that looks at bringing all of the technology together in cities and figuring out how to electrify, figuring out how to collect, use, monetize data, how to do contactless charging of vehicles as they travel around cities, how to work with people like NV Energy so you have got the right energy in the right place so you do not have to spend eight hours charging your vehicle.

Ms. Shani Coleman, Clark County, asked Mr. Anderson if the thought is that we maybe forego some of the traditional infrastructure that's currently utilized in other cities and maybe just look towards some of the more leading edge technology type stuff or if we need to focus on filling in the gaps for both.

Mr. Anderson discussed and explained he believes what is politically practical is to use traditional resources to fund traditional infrastructure, and to try to attract private investment to do infrastructure. Mr. Anderson advised the working group what he thinks is most important is to avoid any kind of a food fight because that creates real problems. There must a plan that shows where you are going and what you want to get done and why this piece fits into that solution. Other pieces of traditional infrastructure need to be triaged because they are not going to use it anymore and what is interesting about traditional infrastructure are the things that need to be upgraded. Mr. Anderson explained the point is that three different kinds of infrastructure, Greenfield, Brownfield, and new infrastructure can be a combination of public and private investment, and the addition of technology.

Ms. Sandra Rosenberg, NDOT, asked Mr. Norman Anderson for a clarification on private investment. Ms. Rosenberg explained when Trump took office and spoke about trillions of dollars of private investment, that is an investment they do expect to be paid back on. In the surface transportation world, it is oftentimes financing not actual funding, and we must pay it back. In other newer technologies, there may be different partnerships at hand, but there is no free money out there so those partnerships are certainly important as well as looking at that big picture of a combination of funding and financing and private investment.

Mr. Anderson explained that is what they are doing with the highway in Ohio trying to figure out, how to set up intermodal facilities on each end and see if you can create a truck autonomous vehicle contactless charging 5G and who will pay for the data. Mr. Anderson's team is building a financial model that he is interested in sharing with the working group because the explosion of technologies is something that has never seen before and trying to figure out how to bring that into infrastructure.

Mr. Victor Wei, UNLV, explained that it is not so hard to find money and infrastructure is what makes a lot of things possible within bureaucracies. The question whether we are talking about energy, transportation, manufacturing or any number of things, the conversation that is usually the most fruitful starts because there was a problem to be solved. Mr. Wei explained when that is posed, bureaucracies come together, and unfortunately, we are all within certain guardrails within our bureaucracies and it is hard to break out of it. Unless, whether you are talking about 5G, Blockchain etc. those types of people who have been innovating, come together and have a dialogue with the bureaucracy that first posed the problem. Mr. Victor Wei, UNLV asked Mr. Norman Anderson what he has found, in his experience so far, of how to attract the ability for one of the bureaucracies to stay the problem.

Mr. Anderson explained that his only way to think about this is to focus around specific projects and look at that project as something you must get done. Mr. Anderson advised that if you can be very specific about who benefits, what the performance looks like around a specific project, then you have a really rich conversation, and you can have actual breakthroughs. Mr. Anderson explained that he has worked all over the world during his career and there were many more US company building previously in comparison to today. There is no leadership among US companies for P3's so there is a lot of work to do on the infrastructure side and it starts with projects, and it starts with successes.

Mr. Roland Stephens, SRI Center for Innovation, Strategy and Policy, presented his PowerPoint on Defining Southern Nevada's Opportunity. Mr. Stephens explained for his presentation he would like to emphasize the question of acceleration. There have been a lot of technologies that he would call general purpose technologists referenced by Norman waiting in the wings, gathering speed over the last 10 years. Particularly, information technologies and smart technologies in terms of connectivity, and then also information technologies in terms of augmenting humans. Mr. Stephens explained that those technologies that were waiting in the wings have been given a giant kick in the rear by this crisis and now the acceleration is 10x. This can be observed in the case of producing vaccines, that what took 10 years has taken 10 months which is a unique crisis. Other changes in the way we work and the way we talk to each other, the way we ship, the way we sound, have gone incredibly quickly and will not bounce back. Mr. Stephens informed the working group that his second point is that there is no going back to the old way.

Mr. Stephens expressed that his task today is to draw some connections between the broader state plan and the question of infrastructure. One piece to emphasize is the need to work on institutional infrastructure along with much else besides. Mr. Stephens explains that even at the end of 2021, Nevada is still going to be below a sort of no pandemic scenario for recovery so recovery will not occur in a matter of months. Mr. Stephens believes once we get into 2022, things will start moving very quickly and it is important take advantage of that. In the recovery plan, there are some long details about immediate recovery and immediate tasks. Mr. Stephens questions what the visionary policies that need to be done not in the next month or two, but in the next year or two to set up the state for the future. Mr. Stephens discussed the resilience role word touched on in the earlier remarks, how taut global supply chains have fallen out of fashion and how there are technologies now to manage them in a much more distributed way. Mr. Stephens remarked that we hope for high voltage connectivity for energy systems but that there will also be distributed energy. Mr. Stephens explains an example is that many people in Texas last week were living in their Teslas and if it is thought about from a different point of view then that was a source of distributed energy in the event of a disruption. Mr. Stephens listed opportunities and threats on his 2018 assessment of the state which include access to West Coast markets, access to the Mountain West markets, realizing Las Vegas is a well brand, mining diversification, being a test bed for new technologies, attracting mobile Millennials and Gen Z as opportunities. People are moving to Nevada every day and the data is in the house prices from the West coast because they can work from home, and then also the opportunity represented by

West Coast costs and congestion. Mr. Stephens explained that the way to realize those opportunities is with the right infrastructure.

Mr. Stephens referenced Rob Lang's map on his PowerPoint and expressed that Nevada is at a crossroads. Southern Nevada is tied to Southern California and Phoenix, and then Northern Nevada with the Bay Area, and Eastern more into the Mountain West. The way to take advantage of a great location is you must build the infrastructure to do so. Mr. Stephens explained that it is valuable if you are in a choice lock on a residential street, but it is only really valuable when you build cool things on that lot. This is the assignment ahead of this committee. And he stated-- I do want to also echo words heard earlier, think in specifics. Rhetoric around infrastructure is everywhere and it has been for years, right. Mr. Stephens referenced the pink region on his power point that is close to 53 million residents and within a reasonable sort of driving, trading distance. To realize that opportunity you need the infrastructure to do it.

Mr. Stephens explained there is going to be onshore, advanced manufacturing and logistics in the United States and Nevada should take its share. There is always going to be niche uses for carbon-based resources 10 years from now, but otherwise everything else is going to be electrified. Nevada should be home to the renewable energy and the battery supply chain. Nevada should be home to electric vehicle technologies and have its streets, roadways and its other infrastructures set up for electrification. Mr. Stephens believes what was observed in the crisis was Nevada state government needs modernizing. Presently the sort of public infrastructures in terms of governance are not there in Nevada. People want to come and live here and come and play here, but you need to have all the attributes that matter. There must be infrastructures that will make Nevada a remote work playground. Mr. Stephens explained that some possibilities in the plan are advanced manufacturing and logistics hubs. Mr. Stephens gave an example on trucks and questioned what they will do, what will they look like in the future, where will they stop, and how will they be serviced if they leave the gate at Long Beach. Mr. Stephens asked what role Southern Nevada can play in that tremendous opportunity. Expanded passenger cargo capabilities were mentioned earlier and about the additional airport capabilities being considered for the Southern part of Clark County. Mr. Stephens discussed that those capabilities are critical as well as increased rail and truck connectivity. Mr. Stephens advised the working group that we must build the infrastructure that turns Southern Nevada into an authentic crossroads and expand broadband connectivity. Increased interconnectivity would allow Nevada to take advantage of more renewables, perhaps geothermal in the North, perhaps bring in wind power from elsewhere. Mr. Stephens expressed that when the West Coast tech companies come here, they expect to buy 100% renewable energy for their facilities, so you need the infrastructure to make that possible such as electric vehicle charging infrastructures. Nevada is the place for people to take their businesses, their new technologies, to operational scale, not just to test them but to go and deploy them in a city setting. Mr. Stephens advised to let people come and let it be the place people go to experiment with their new technologies.

Mr. Roland Stephens' final point was on community development of financial institutions which is a sort of placeholder for the larger question of thick financial infrastructure, institutional infrastructure, which will help sustain actual infrastructure. The state infrastructure bank is a big

part of that. Mr. Stephens expressed his interest for a sovereign wealth fund in Nevada. Nevada has minerals which is the basis upon which you could fund a sovereign wealth fund. The sovereign wealth fund is a controversial idea, but it is certainly something that you see elsewhere in the world. Mr. Stephens concluded everyone should communicate with their representatives and lobby for the Southern Nevada public land management act, because you just do not have the space to do some of the things you need to do in terms of the opportunities.

John Restrepo, RCG Economics, presented alongside Mr. Hubert Hensen, RCG

Economics. Mr. Restrepo explained their discussion will be on the issue of land scarcity or land availability in Southern Nevada, to accommodate the needs from an economic development standpoint. The discussion will also accommodate the strategies that Mr. Roland Stephens previously spoke about relative to where we are heading from a diversification resiliency standpoint. Mr. Restrepo informed the working group that they were commissioned to prepare a hybrid study of two studies that were done in 2015 and 2016. One was commissioned by NAIOP with Dr. Alan Schlottmann of UNLV, a regional economist, looking at the economic impacts of having an insufficient amount of land to accommodate growth, the economic GDP and earnings impact. The second study was commissioned by LVGEA, to have just the land inventory of developable land in the Las Vegas Valley at that time looked at. Mr. Restrepo explained that this hybrid study that was just completed is a blend of those two previous studies together which looks at the land inventory as well as the economic impacts of having an insufficient amount of land. There is an issue of land as it is sort of forgotten as a critical component of the production process and within the labor component, there is skilled labor. The issue of how we are going to deal with land and the shortage thereof is critical which started becoming an issue in '04 and '05 when the economy was strong and growing rapidly. Mr. Restrepo informed the working group that when the Great Recession hit in '08 through about 2014 or 2015, that the demand for land slackened and people forgot we were in a sort of land constrained situation in Southern Nevada. Since that time there has been growth and land constraints have emerged again here. Mr. Restrepo explained that RCG has prepared a study for the Treasurer's Office and for GOED on the issue of supply chains, where Southern Nevada stands, and the state of Nevada stands in a supply chain of the West Coast US. Mr. Restrepo informed the working group that a critical component which is being discussed right now in Congress is the Clark County Lands Bill. Mr. Restrepo explained that he believes we need to have a healthy economy, which ties into a healthy supply of land in order to have a healthy, natural environment.

Mr. John Restrepo commended Dave Johnson and his team at the Southern Nevada Water Authority who provided parcel data needed to run the model and to look at where we were in terms of amount of developable acreage in Las Vegas Valley. Parcels at 20 acres or larger that were freeways, that were near rail, that have a slope no greater than 7% were looked at as well which screened down the inventory of land in the Valley. Mr. Restrepo introduced Mr. Hubert Hensen, RCG Economics, as the main economist on their project who provided the detailed, technical modeling and statistical analysis.

Mr. Hubert Hensen, RCG Economics, explained their project was to come up with a supply of parcels in the Las Vegas area which was whittled down to 20 plus acres of land with a certain slope. The focus was narrowed to undeveloped parcels that are developable in the next three to five years. To get to a final list, a certain set of filters were applied which removed oddly shaped parcels that are unlikely to be useful. Mr. Hensen explained they only looked at commercial, industrial, and open-space parcels and removed parcels that are owned by residential developers and narrowed the list to parcels within a mile of a road. The final list of parcels that was found included a certain grouping in the Speedway area, which includes Apex and another cluster of parcels in the El Layonte area, which include one in the Northwest as well as one in the Centennial Hills area and West Henderson. Mr. Hensen informed the working group that they consulted developers in the region and created a scoring methodology based on several factors. The scoring methodology was applied on 19,000 acres of space in the final parcel list and found about 9,000, 45%, of those acres were better suited to development for the purposes that we were looking at. The acres were compared to how much demand there would be over the next 15 years or so and calculated there were about 14,100 acres of demand for land by 2035. Mr. Hensen reminded the working group that only about 9,000 of those acres are well suited to developments and found those acres are less than the 14,000 acres that the value will need to meet projected growth. Mr. Hensen discovered that 20 plus acre parcels were privately owned parcels, less than 10%. Larger parcels are required to build certain types of buildings, especially with e-commerce companies.

Mr. Hubert Hensen explained that in order to promote new sectors in the economy, those new sectors must acquire larger acreages, and as such not having those acreages is a problem for the economy in the region. The lack of suitable land can create economic disadvantages for firms in the region which end up being seen as cost disadvantages. Mr. Hensen explained they had modeled what these disadvantages would do to the economy based on where we expect the economy to be without land constraints. Two different scenarios were looked at, one which was modeled a 3% cost disadvantage to companies and firms in the region and the second was modeled a 5% cost disadvantage. Mr. Hensen found that by 2035 that growth, in terms of economic output in the region, between now and then would decline from 2.8% per year down to 1.9% in the 3% disadvantage scenario, and down to 1.3% in the 5% cost disadvantage scenario. Mr. Hensen explained that a 5% cost disadvantage leads to more than halving of growth over the next 15 or so years which leads to a 14 to 22% reduction in economic output in 2035. Mr. Hensen advised the working group that the same was with job and that they would be reduced by 11 to 18%, which is roughly 200,000 jobs to 330,000 jobs fewer than we would have had in 2035.

Mr. John Restrepo explained the difference in the output in a 5% cost disadvantage compared to the base case which included no land constraints, is a loss of about \$70 billion of GDP between 2018 and 2035. Mr. Restrepo concluded that the point of their presentation is to show the need for land, to allow us to move forward to a more resilient economy is very critical which is also tied to the types of companies who are trying to relocate here. The question of land and what kind of companies are trying to accomplish onto those parcels is very critical. Mr. John Restrepo explained that what will happen to the Ivanpah Airport land, the Federal Lands Bill in

Congress, as well as the widening of the I-15 to Southern California is critical so as to see how to take advantage of our strategic locational role. The question of having the physical resources, in this case land to accommodate that is critical. Local commercial development community in town, industrial developers, commercial developers, and commercial brokers are having increasing challenges attracting businesses here. Mr. Restrepo informed the working group that the whole issue of land is an economic development question as well. Mr. Restrepo explained that unfortunately folks that come here and see our land prices are relatively high and we don't have large parcels decide to go to Texas or to Arizona, and in some cases the Salt Lake region. Mr. Restrepo explained that the question of how we marry our land resources to our economic development strategies and our infrastructure strategies is a critical piece of the whole puzzle that we want to make sure stays at the forefront, so that we can move forward and be able to develop a more resilient economy.

6. INTRODUCTION OF AGENDA ITEMS SCHEDULED FOR MARCH MEETING

Chairman Kristopher Sanchez explained that a list of the follow-on proposed topics for each of the subsequent meetings for the working group to consider will be distributed by the next meeting. The next meeting will focus on smart ports, inland ports and intermodal facilities and maximizing Southern Nevada's geographic location. Chairman Sanchez informed the working group that the next meeting will also hold a panel discussion on building regional networks, freight flow in the Southwest and Southern Nevada's opportunity and the future of rail development in Southern Nevada. Also, smart ports, inland imports, intermodal facilities, and identifying a framework that will work for the region.

7. WORKING GROUP MEMBER COMMENTS

There were no member comments given.

8. PUBLIC COMMENT

Mr. Peter Guzman, Latin Chamber of Commerce, commended the chair and members as well as the featured presenters. Mr. Guzman explained that he believes people are beginning to see hope which may create an even stronger comeback. Mr. Guzman thanked the chair for forming this working group and his tremendous work in trying to create opportunities, not only for Southern Nevada, but for Nevada as a whole, but certainly Southern Nevada.

9. ADJOURNMENT

CHAIRMAN KRISTOPHER SANCHEZ ADJOURNED THE MEETING.