

**MINUTES OF THE MEETING  
OF THE  
ASSEMBLY COMMITTEE ON COMMERCE AND LABOR**

**Seventy-Ninth Session  
June 2, 2017**

The Committee on Commerce and Labor was called to order by Chair Irene Bustamante Adams at 5:34 p.m. on Friday, June 2, 2017, in Room 4100 of the Legislative Building, 401 South Carson Street, Carson City, Nevada. The meeting was videoconferenced to Room 4406 of the Grant Sawyer State Office Building, 555 East Washington Avenue, Las Vegas, Nevada. Copies of the minutes, including the Agenda ([Exhibit A](#)), the Attendance Roster ([Exhibit B](#)), and other substantive exhibits, are available and on file in the Research Library of the Legislative Counsel Bureau and on the Nevada Legislature's website at [www.leg.state.nv.us/App/NELIS/REL/79th2017](http://www.leg.state.nv.us/App/NELIS/REL/79th2017).

**COMMITTEE MEMBERS PRESENT:**

Assemblywoman Irene Bustamante Adams, Chair  
Assemblywoman Maggie Carlton, Vice Chair  
Assemblyman Paul Anderson  
Assemblyman Nelson Araujo  
Assemblyman Chris Brooks  
Assemblyman Skip Daly  
Assemblyman Jason Frierson  
Assemblywoman Sandra Jauregui  
Assemblyman Al Kramer  
Assemblyman Jim Marchant  
Assemblywoman Dina Neal  
Assemblyman James Ohrenschall  
Assemblywoman Jill Tolles

**COMMITTEE MEMBERS ABSENT:**

Assemblyman Ira Hansen (excused)

**GUEST LEGISLATORS PRESENT:**

Senator Moises (Mo) Denis, Senate District No. 2



**STAFF MEMBERS PRESENT:**

Kelly Richard, Committee Policy Analyst  
Wil Keane, Committee Counsel  
Kathryn Kever, Committee Secretary  
Olivia Lloyd, Committee Assistant

**OTHERS PRESENT:**

Jenny Reese, representing Coalition for Community Solar Access  
Jessica Scott, Regional Manager, Vote Solar  
Christopher W. Mixson, representing Vote Solar  
Tom Polikalas, Private Citizen, Reno, Nevada  
Howard Watts III, Private Citizen, Las Vegas, Nevada  
Rudy Zamora, Program Director, Community Housing Improvement Systems and Planning Association, Inc., Nevada  
Iridane Sanchez, Private Citizen, North Las Vegas, Nevada  
Carolina Chacon, Private Citizen, Las Vegas, Nevada  
Maria-Teresa Liebermann, Private Citizen, Las Vegas, Nevada  
Verna Mandez, Private Citizen, Las Vegas, Nevada  
Rose McKinney-James, representing Bombard Renewable Energy; and Valley Electric Association, Inc.  
Jessica Ferrato, representing Solar Energy Industries Association  
Kyle J. Davis, representing Nevada Conservation League  
Judy Stokey, Vice President, Government and Community Strategy, NV Energy  
Ernest E. Adler, representing the International Brotherhood of Electrical Workers, Local 1245  
Danny L. Thompson, representing International Brotherhood of Electrical Workers, Local 396 and Local 1245  
Garrett C. Weir, General Counsel, Public Utilities Commission, State of Nevada

**Chair Bustamante Adams:**

[Roll was called.] Today we have one work session and one bill. We are going to start with our work session on Senate Bill 498 (3rd Reprint).

**Senate Bill 498 (3rd Reprint): Revises provisions relating to mortgage brokers, mortgage agents and mortgage bankers. (BDR 54-484)**

**Kelly Richard, Committee Policy Analyst:**

The bill before you is Senate Bill 498 (3rd Reprint) ([Exhibit C](#)). It is sponsored by the Senate Committee on Commerce, Labor, and Energy and was just heard in this Committee earlier this week. The bill eliminates the requirement for an annual standard examination of mortgage brokers and mortgage bankers and instead requires the Commissioner of Mortgage Lending to conduct, at his or her discretion, periodic standard examinations of mortgage brokers and mortgage bankers.

The bill also eliminates certain courses of continuing education relating to the laws and regulations of the State and reduces the number of hours of continuing education required for a mortgage broker or mortgage agent from at least ten hours to at least eight hours annually. Finally, S.B. 498 (R3) allows the Commissioner to waive the required monthly activity report submitted by mortgage brokers and mortgage bankers if substantially similar information is available to the Commissioner from another source.

**Chair Bustamante Adams:**

Are there any questions on the bill? [There were none.] I will entertain a motion to do pass.

ASSEMBLYWOMAN JAUREGUI MOVED TO DO PASS  
SENATE BILL 498 (3RD REPRINT).

ASSEMBLYMAN OHRENSCHALL SECONDED THE MOTION.

THE MOTION PASSED. (ASSEMBLYMEN PAUL ANDERSON,  
CARLTON, FRIERSON, AND HANSEN WERE ABSENT FOR THE  
VOTE.)

I will assign the floor statement to Assemblywoman Jauregui.

We have Senate Bill 392 (2nd Reprint). In order to be able to allow other committees to meet, we are limiting testimony to three minutes. I want to thank Las Vegas—I know there were about 15 to 20 people in Las Vegas yesterday, and we had to reschedule the meeting. I know all of them could not come back today, but they took a picture and signed in so we know those who are in support. I appreciate it and will enter their letter into the record ([Exhibit D](#)).

**Senate Bill 392 (2nd Reprint): Revises provisions relating to energy. (BDR 58-663)**

**Jenny Reese, representing Coalition for Community Solar Access:**

The Coalition for Community Solar Access is a 501(c) trade organization working to expand the market for community solar projects. They officially formed in early 2016 and have been working to build an industry expertise and provide education to policymakers in jurisdictions considering community solar projects. We would like to thank Senator Denis for introducing this bill. We strongly urge your support of Senate Bill 392 (2nd Reprint). I will turn it over to Jessica Scott to go over what a community solar garden is.

**Jessica Scott, Regional Manager, Vote Solar:**

As Jenny stated, Senator Denis has introduced community solar because the traditional panels-on-your-roof approach to solar simply does not work for most Nevadans. A report from the National Renewable Energy Laboratory found that 73 to 78 percent of homes cannot put solar on their roof due to tree shading, orientation, or other factors. As of 2015, Nevada was home to half a million renters who do not have an option to install solar panels on their rooftops. Community solar addresses these barriers by allowing consumers to

subscribe to a local solar project and receive credit on their utility bills for their portion of the clean power produced from that project. Currently, the majority of residents are excluded from participating in the clean energy economy, including those in multifamily units, renters with varying bill arrangements, and lack of roof ownership. Low-income families are more likely to face these barriers, as well as financial difficulties in obtaining solar power on their own. Senate Bill 392 (R2) addresses this critical access gap. A community solar project, also called "shared solar" or "solar gardens," would be owned and operated by a subscriber organization made up of ten or more customers of a utility. The solar garden must be located in that utility service area. The power is fed into the grid, and the subscribers receive a credit for what is produced. That credit lowers the subscriber's energy bill, allowing them to gain the benefits—including financial—of solar energy without having to tie it directly to their property. The subscriber organization also owns any portfolio energy credits that are generated by the project.

Community solar expands access to anyone and everyone wanting solar energy. Participating in community solar, someone unable to install solar can still receive its benefits. Community solar works by allowing individuals—which can include businesses, churches, and community groups—to have the freedom to come together and develop solar arrays to participate in a clean energy economy. Fifteen states and the District of Columbia already have community solar state policies in place, and ten of these have some form of energy choice in place. Community solar has grown exponentially in the last six years, growing from a handful of projects installed before 2010 to more than 111 projects across 26 states and 77 utility service territories at the start of 2016. This no-roof-needed policy provides expanded energy choices for all Nevadans, including low-income communities, renters, and those with unsuitable roofs.

Community solar can provide long-term financial relief and stability to families who are struggling with high and unpredictable energy costs. Community solar projects are even cheaper than the same amount of rooftop solar because they are built on an ideal site and only require the assessments, planning, and maintenance for one project instead of ten or more. Senate Bill 392 (R2) guarantees that at least 10 percent of program capacity will be dedicated to low-income residential customers, making sure that communities that have been disproportionately impacted by traditional power generation can receive the benefits of clean energy.

Senate Bill 392 (R2) helps finance this low-income participation through a portion of the existing unused balance of the RenewableGenerations fund. By opening these opportunities to more residents, we can create good jobs in one of America's fastest growing industries. Opportunities to leverage this momentum can further serve growing regional, national, and global markets to offer real benefits for Nevada's economy and good-paying jobs for the state's residents. Clean Energy Collective estimates that S.B. 392 (R2) would bring \$500 million of private investment into the state by 2023.

Senate Bill 392 (R2) would create another 200 megawatts of new solar capacity. I would like to introduce Christopher Mixson, who is also representing Vote Solar, to walk us through the bill language.

**Senator Moises (Mo) Denis, Senate District No. 2:**

Madam Chair, I will do the introduction first. I am proud and excited to bring Senate Bill 392 (R2), which allows for the development of community solar gardens to this Committee for consideration. I will say the reason I even found out about this is that I was at a national conference and we were talking about energy and power in the Hispanic community and whether access would be available. One of the concepts was this concept. I looked into it further, which is where my interest came to do this.

Senate Bill 392 (R2), which passed the Senate last night with a strong 17-4 bipartisan majority, will bring access to the benefits of solar to those who have previously been unable to participate in the solar economy. As this Committee is aware, Nevada is blessed to have numerous sources of renewable energy, including geothermal and solar. Included in those policies is the ability of homeowners and businesses to directly participate in the solar economy by placing solar panels on their roofs, connecting with the electric grid and receiving a fair and reasonable credit on their utility bill for that power.

Unfortunately, there is a segment of the population that has been excluded from the opportunity to directly participate in the solar economy. I have heard from many constituents who are not able to participate directly in the solar economy for various reasons. Maybe they are a renter, or live in a condo, townhome, or with a shared roof, or their home's roof is unable or uneconomic to support solar panels. So while more than 30,000 homeowners have been able to go solar, there are many whose homes simply do not allow them to share in and benefit from this great resource.

Community solar gardens provide the opportunity for those who have previously been unable to participate in the solar economy or the opportunity to do so despite these limitations. Community solar gardens are essentially off-site solar systems where multiple customers participate through subscription and receive a credit on their electric bill for the energy their shared solar rate provides to the grid. We have talked about how 14 states and the District of Columbia have passed legislation concerning this. It is time we do the same to expand this great renewable resource to all Nevadans.

Senate Bill 392 (R2) has another critical component to ensure that community solar gardens provide the opportunity for solar access to all Nevadans. It includes a provision that the Public Utilities Commission of Nevada (PUCN) requires that at least 10 percent of the program be available for use by low-income customers and low-income service organizations. That is critical. It is not just low-income individuals, but also nonprofits and others who will be able to benefit from this. This provision is critical to expanding access to many of my constituents who are not only renters but also low-income individuals who seek the same opportunity as rooftop customers to participate in the solar economy in a cost-effective way.

**Christopher W. Mixson, representing Vote Solar:**

I will quickly walk you through some of the highlights of S.B. 392 (R2). Turning to sections 1 and 2, these are the incentive programs for community solar. It gathers the wind, hydro, and solar incentive programs that currently exist under the RenewableGenerations Program and combines them into one incentive program for solar. It authorizes \$1 million per year from that single incentive program specifically for low-income customers who want to go solar. Finally, it adds community solar gardens as an authorized use of the solar incentive program.

Sections 4 through 10 are the definitional sections of the bill. It basically defines a "subscriber," a "subscriber organization," and a "subscription" to a community solar garden. I would note that in the definition for "community solar garden," it specifically limits the size of a single community solar garden to 12 megawatts.

Section 11 directs the PUCN to adopt regulations for community solar gardens. That would include establishing a statewide goal of 200 megawatts for community solar gardens by 2023, along with specific requirements for each community solar garden. Each garden must have a minimum of 20 subscribers. No single subscriber to a community solar garden can have more than 40 percent of the total output of the community solar garden, and each subscriber or organization is required to have at least 40 percent of its subscribers be 25 kilowatts or less. That is intended to make sure that a large proportion of each community solar garden is for residential and small business subscribers.

Through an amendment that has already been passed, we addressed a colocation concern, and this is a concern of stringing together multiple community solar gardens to exceed the 12 megawatt limit. The language precludes any single parcel of land from having more than 12 megawatts of community solar. Finally, as you have already heard, in section 11, there is a provision that says at least 10 percent of the entire statewide capacity of community solar gardens in Nevada must go to low-income subscribers.

Section 12 is the bill credit mechanism for a community solar garden. In a nutshell, every subscriber to a community solar garden gets a bill credit based on that subscriber's proportional share of the electricity produced by the community solar garden. In Assembly Bill 405, there is a reduction in the bill credit value for rooftop solar. Under a proposed amendment that you have before you ([Exhibit E](#)), community solar gardens would also have their bill credit value reduced the same amount as rooftop solar. It also directs that the subscriber organization must, on a monthly basis, provide information to the utility for the utilities' billing purposes for each subscriber.

Sections 12.3 and 12.8 are the consumer protection provisions for community solar gardens. Again, these closely track what is in Assembly Bill 405 for rooftop solar where applicable to community solar gardens. Specifically, there will be three parts each subscription must have: a cover page, a written contract, and disclosures.

Section 13 deals with what we call "unsubscribed electricity" from a community solar garden. If it happens that a community solar garden has not had subscribers for all of its output, the utility pays the subscriber organization what we call the "qualified facility rate," which is a very low rate for the electricity. Section 14 deals with the renewable portfolio standard (RPS), and it simply says that community solar gardens count toward the RPS for solar and that the portfolio energy credits will be owned by a subscriber organization.

Section 15 clarifies that a community solar garden is not a utility, and section 17 addresses amending the bill so that the credit value is tied to the reduced bill credit values for rooftop solar. That is a quick highlight of all the important provisions of S.B. 392 (R2).

**Chair Bustamante Adams:**

Do you have an amendment? Can you discuss it now before we take questions?

**Christopher Mixson:**

I would be happy to discuss the proposed amendment ([Exhibit E](#)). I would say that the most important part is section 12, subsection 2 where it describes how the bill credit values for the subscribers to a community solar garden will be reduced based on the reduced credit that will be applied to rooftop solar. That is the main point of the amendment. The amendment deletes provisions of S.B. 392 (R2) as passed in the Senate that would have directed the PUCN to hold a proceeding. By deleting those provisions, our intent is to remove the fiscal note to the extent it is still on there after the passage in the Senate.

**Chair Bustamante Adams:**

Are there any questions from the Committee members?

**Assemblyman Daly:**

I have a question on section 11, subsection 1, paragraph (b), subparagraph (3), where it says: "Require a subscriber organization to make at least 40 percent of the total generating capacity of the community solar garden available in subscriptions to the community solar garden that are 25 kilowatts or less." Why are we only making it "at least 40 percent"? Obviously, it can go higher, but what happens to the other 60 percent?

**Jessica Scott:**

The intent of the 40 percent cap for an individual anchor would be that we can have a diversity of customers participating. Our intent is to have both residential and commercial small business customers being able to participate. We want to avoid a situation where one large company could purchase the full amount of the output. This ensures there is a diversity of customer classes that can participate.

**Assemblyman Daly:**

That only applies to community solar gardens that are more than 25 kilowatts or less? Are they allowed to be more than 25 kilowatts?

**Jessica Scott:**

We have a cap for a large subscriber at 40 percent, and a cap so we can make sure there is the minimum amount of residential customers in each project as well.

**Assemblyman Daly:**

So you can have community solar gardens that are more than 25 kilowatts?

**Jessica Scott:**

No. The intent is to be able to finance these projects. If you have an anchor tenant with 40 percent, that can help with underwriting for the financing of low-income customers and smaller customers.

**Senator Denis:**

In subparagraph (4), subsection 1 (b) of section 11, on page 6, it says that the project cannot be larger than 12 megawatts.

**Assemblyman Daly:**

So the requirement is only on the ones for 25 kilowatts or less, and someone cannot have more than 40 percent. But if you are up to 12 megawatts, what are the parameters then? One person can have all 12 megawatts?

**Christopher Mixson:**

I think what you are asking is about the 25-kilowatt number. That is not a project size number; it is a subscriber number, so 25 kilowatts is a smaller user. The intent of the bill is to require that each community solar garden be made up of at least 40 percent smaller users who are—in this bill—considered 25 kilowatts or less. That is residential and small business.

**Assemblyman Daly:**

How many subscribers are they required to have as a minimum, if you have one?

**Christopher Mixson:**

Each community solar garden is required to have at least 20 subscribers.

**Assemblyman Daly:**

This is the reason I did not like Assembly Bill 405—this has a similar subsidy/rate return. It is a similar program. If you do not have rooftop solar, you are subsidizing the people who do.

**Jessica Scott:**

The intent is to have a diversity of customer classes. Low-income customers are typically more expensive to serve, so in structuring the programs in this way, we can make sure to maximize service and participation from low-income customers. In reference to cost shift, as a solar advocate, we would disagree that there is a cost subsidy. Senate Bill 392 (R2) is following the right structure of A.B. 405.



**Assemblyman Daly:**

As a person who disagrees with your assessment of being a solar advocate, there is a subsidy, and it has the same subsidy scheme.

**Assemblyman Kramer:**

I want to talk about that part too. My understanding is—I am going to use an example of a rooftop solar where somebody comes along and finances the installation of the solar panels on your roof and you make your payments each month and those payments—you get a credit on your electric bill and the credit on your electric bill is a little more than the payment you make, so you come out a little bit ahead each month. This allows a garden of solar panels or whatever renewable energy project you have. Different subscribers would then assign to pay off the financing of it and get credit for some of the power such that, applied to your home power bill or your small business power bill, you would save a little bit each month on it. That sounds really good in the sense you would save money on your power bill because your financing of this would be less than the savings on the power, so you save a little money each month. If that is the case, then why would we limit it at all? Why would we limit it to 200 megawatts? Why would we limit it to 12 megawatts? Why would we limit the 40 percent, 60 percent, 25 kilowatts—why would there be any limits at all if this worked? Why not just open it up? I would suppose it is because it does not work at high volumes and there is some point where the market cannot absorb that much energy during the time of day when solar works. If there is a subsidy that is being implied, in my mind it means that the rates will go up for the regular ratepayers—the people who are not involved in this. At 200 megawatts, what is the anticipated increase in rates for the regular ratepayers?

**Jessica Scott:**

First of all, we limited this to 200 megawatts simply to create a program in Nevada and get things started. The market can absolutely bear a larger capacity than that, but we want to introduce the program and get it started to prove that it can work. The costs of solar are falling exponentially and to do a project like this where you are leveraging economies of scale, you can provide that energy at an even lower cost. We would be able to provide energy to customers at a lower cost, so in many ways there would be a net benefit to all customers.

**Assemblyman Brooks:**

I think it might be a little helpful for me and other members of the Committee if you could walk through an example of one of these projects. If one of the projects is 12 megawatts maximum on one particular project, would that be 12 megawatts on one site? Then you could have one individual off-taker of up to 40 percent of that 12 megawatts, and then 40 percent of the 12 megawatts has to be—system size is 25 kilowatts or smaller. Would you give an example of an ideal situation? If you built one of these 12 megawatt systems, what does it look like, who is signing up, and at what cost?

**Jessica Scott:**

I can start on this, and I know that there are people in the audience who can speak to specifics on this from individual projects. Colorado was the first state to have community solar

gardens, and the example that comes to mind is the Pueblo School District. In Colorado, there is also a limit on anchor tenants, so the Pueblo School District has been able to offset their energy by participating in two separate community solar projects. Those community solar projects can also have participation from residential consumers as well. Many businesses lease their storefronts and they cannot put solar on their buildings, so this would allow many retail businesses to also go solar and get that direct benefit onto their business energy bill from it. There would be full diversity.

Another example that comes to mind is Shiloh Temple in Minnesota. That project is hosted on the rooftop of a church, and there are congregation members who are subscribed to that project. There is also a workforce development component, so members of the community can work on installing the solar and get jobs in the solar industry. Many times there is a nonprofit partner to help with the administration of the program and getting community members involved. There are so many different flavors of community solar and different ways that these are structured and different participants.

**Tom Polikalas, Private Citizen, Reno, Nevada:**

Having some experience with marketing community solar when I worked with a utility in Colorado, our motto was to aggregate capital from those who were interested in participating in advance. We did a premarketing program and solicited participation. As an example, Assemblyman Brooks might be interested in one panel or more, but a capacity of \$1,000—I, myself, might be in that same range—but we aggregated capital in advance of building it. It was on a completely volunteer basis, so we knew the total capacity of the solar array and the investment we had from our consumers. By that standpoint, we were able to again finance in advance and then construct in a fairly short amount of time our first community solar array.

**Senator Denis:**

You would have one anchor tenant, which could be a school or a church. Then you would have some businesses and nonprofits, and you could have whatever number there, depending on what their needs are, and then you would have subscribers that could be low-income, but could also be just apartments and others who are not necessarily low-income. You would have a mix of different people who would be subscribing as a co-op, but some would be heavier users of the power than others.

**Assemblyman Ohrenschall:**

If this bill passes, the goals that it has for these community solar gardens, how do you think they will affect our total—the push to the increased RPS standards that are in the other bills that my colleague, Assemblyman Brooks, is working on?

**Christopher Mixson:**

I am not fully up to speed on the current goals and the proposed RPS bill right now. Community solar gardens under S.B. 392 (R2) would count toward the renewable portfolio standards for solar.

**Assemblyman Ohrenschall:**

Would someone be able to be a participant if they are in a rural community and they are off grid, and they would like to be part of this group of people who benefit from the community solar gardens but they are not tied to the grid? Certainly, there is Professor Sagebiel at the University of Nevada, Reno, who lives off of Mount Rose Highway in Reno. He is still in an urban area but, as I understand it, his home is completely off-grid. Would he be able to participate in this, being that he is not tied to the grid of the power company?

**Jessica Scott:**

The way that we have S.B. 392 (R2) structured right now, you have to be grid-tied. You have to be connected to the grid. Off-grid customers would not be able to participate, although future changes to the program could accommodate that.

**Assemblyman Ohrenschall:**

So it would have to be future statutory legislative changes, and right now, under this framework that we know, there is no option for off-grid consumers who want to participate?

**Jessica Scott:**

Because of the billing structure, you have to receive a utility bill in order to get the credits onto the bill, so you would have to be a utility customer to participate.

**Chair Bustamante Adams:**

We are going to move to those in support.

**Howard Watts III, Private Citizen, Las Vegas, Nevada:**

I am here today in support of S.B. 392 (R2). Thank you for mentioning the fact that we had about 20 people here yesterday. We understand that it is the final days of the Legislature and schedules are hectic. There is broad and diverse community support for this bill. It is a measure that implements energy justice by expanding the ability of community members to participate in the clean energy economy. As was stated before, people who are not able to get rooftop solar right now will be able to tap into a local community solar grid and participate in it. That includes not only low-income communities, but also large and small businesses, and all residents who may rent or have roofs that are unsuitable for traditional rooftop solar.

Also, by potentially tying the rate structure to A.B. 405, I think it addresses some concerns, because over time the utility will be able to take that energy that is coming to them and then sell it at 100 percent of the retail rate, which offsets concerns about costs to other ratepayers. I think this is a great measure. It allows everyone to participate in solar and in the clean energy economy.

One speaker who is unable to be here today is Reverend Leonard Jackson with the Faith Organizing Alliance. Unfortunately also, at this stage in the Legislature, we are not able to see the video of the Shiloh community solar project, which was played at the Senate Subcommittee hearing. It is an impressive church-oriented model that provides

workforce development and supports the congregants in the community around the church. Faith Organizing Alliance and the First African Methodist Episcopal Church are ready. They want to book their plane tickets now to go to Shiloh in Minneapolis and see how this was set up and how they can implement a similar model for community members and residents here in Nevada. I urge your support for this bill so they can go and bring community solar, and other entities can also bring community solar gardens here to the state.

**Rudy Zamora, Program Director, Community Housing Improvement Systems and Planning Association, Inc., Nevada:**

I am here representing Community Housing Improvement Systems and Planning Association of Nevada. Unfortunately, most of our members and *promotores* could not be in attendance today, but I am here to speak on behalf of them and myself. As a renter, I am not able to buy into rooftop solar at the moment, and allowing community solar would allow me and many other renters in my neighborhoods in Senate District 2 to buy into community solar programs. I urge you to please support community solar.

**Iridane Sanchez, Private Citizen, North Las Vegas, Nevada:**

I am here today in support of S.B. 392 (R2), speaking as someone who previously lived in various types of rental properties over the last five years after my family lost their house in the economic crash of 2009 ([Exhibit F](#)). We lived in various rental properties during those years, and even if we had had the financial ability to lease or purchase solar panels for our roof, we would have had to acquire permission from the rental property owner. And, then, once we left, because we were moving quite frequently—every year or so—it ultimately would have benefitted the owner of the house or the rental property. We would have lost out on all of those benefits in order to be able to lower and stabilize our bill. Oftentimes, especially during the summer, those prices start to surge anywhere from \$300 and upwards during the summertime for energy bills. With community solar, we would have received the benefits of being able to have solar. I also think it is great for Nevada and all Nevadans because it puts more solar panels in the state and it also provides clean energy, which I think is very important for all the communities in the state.

**Carolina Chacon, Private Citizen, Las Vegas, Nevada:**

I am here to support S.B. 392 (R2). I want to echo the comments of other supporters. I am also a renter and would love to participate in community solar programs like this. Specifically, I want to talk about low-income Nevadans who, I believe, should definitely not be left out of the clean energy economy. They are the ones who most deserve to have their bills lowered and be able to participate in programs that will help share in cleaning both our air and making our energy more efficient. Thank you for your support.

**Maria-Teresa Liebermann, Private Citizen, Las Vegas, Nevada:**

I am here to support S.B. 392 (R2) because it will help low-income Nevadans and all Nevadans to be able to harness the power of the sun and be part of the clean energy economy and make Nevada an international leader in the clean energy economy. Now, more than ever, we need everyone to be a part of moving over to renewable energy. I was also one of those people—I grew up in a community where everyone was living in apartments and were

renters. Luckily, a couple of years ago, I was able to buy my own house. Most people that I know are still renters and want to be part of the solar revolution but are not able to do that. This will really help our community that is wanting to be part of the clean energy economy and be part of protecting our future by moving over to renewable energy sources. Please think about these Nevadans that do not have access to solar, because they are counting on you to help them be a part of this clean energy future. Please support this bill.

**Verna Mandez, Private Citizen, Las Vegas, Nevada:**

I am a strong supporter of S.B. 392 (R2). Renewable energy is the energy of the future. We can no longer rely on dirty fossil fuels to power our homes because we know that eventually they will run out. We must grow and develop with the times. I support S.B. 392 (R2) because it will allow families and businesses to harness the power of the sun for electricity, even if they have apartments, rent office spaces, or have homes that are not suited for solar. The idea that low-income families do not care about clean energy is totally false. We would rather use renewable energy to power our homes. This bill would give us access to renewable energy, and for that reason I support S.B. 392 (R2).

**Rose McKinney-James, representing Bombard Renewable Energy; and Valley Electric Association, Inc.:**

I think that, based upon the testimony you have received, you know that community solar represents an important component to what I hope will be a comprehensive clean energy policy framework. Over the years of my own advocacy, there has been one resounding theme, and it is that solar is not available to every aspect of a community. As a matter of fact, that argument has stalled many of the conversations that we have undertaken over the years because we have been trying to find a path to ensure that every Nevada citizen can take advantage of these remarkable resources. It is not something that is just available to first adopters. It is not something that is only available to the affluent. I think this measure takes a critical step towards addressing that gap.

I know there was some discussion around cost shifts. I think it is important to note that we have had a lot of debate around the costs associated with renewable resources. When you talk about cost, in most analyses you need to talk about both the cost and the benefits. I have not heard a lot of conversation around the benefits associated with solar. If you are going to use the math as an equation, it is cost and benefits, and there are substantial benefits that can be quantified when we talk about solar as a resource.

The Committee is aware that Valley Electric has made a long-term commitment to renewable resources, and indeed we have a 15-megawatt community solar project for their members. They anticipate combining storage with that solar in an effort to advance these resources on behalf of their members. Nevada is an established leader in clean energy, and by embracing technology and recognizing the economic development benefits associated with this growing industry, our community can take full advantage of it. Community solar provides another avenue to allow us to advance these opportunities. I urge your support of S.B. 392 (R2).

**Tom Polikalas:**

I am a native Nevadan and Reno resident. My primary concern with energy policy is national security. A good reference is a study that was presented to the Senate Subcommittee on Energy by Vice Admiral Lee Gunn. He described distributed generation as one of the ways in which we can enhance the resiliency of the electric grid and increase our national security. Community solar, as part of the overall concept of distributed generation, is one of the ways in which we can enhance our national security.

Secondly, I was one of the 72 percent of voters who voted for energy choice, and I think there is no simpler, more expeditious way to provide for energy choice than by facilitating community solar. It gives those of us who live in apartments and other situations as described a quick choice and something that I think a number of Nevadans, if not the full 72 percent, would like to see expedited.

In terms of economics, I would also like to reference testimony that was presented by the American Jobs Project to the Senate Subcommittee on Energy. They found, in a study specific to Nevada, that solar technology is one of the tremendous opportunities that Nevada has to enhance economic development to the specific tune of more than 28,000 jobs potentially being created through policies that would facilitate the support of solar and battery technologies.

Finally, I have a 12-year-old son at the Caughlin Ranch Elementary School [in Reno], and my experience was that kids love to see solar at schools. I would love to be part of helping school districts facilitate community solar arrays at a scale that is much smaller than the 12 megawatts, such as the 50- to 100-kilowatt range, in something that kids could see and have direct experience with.

**Jessica Ferrato, representing Solar Energy Industries Association:**

The Solar Industries Association represents 1,000 companies nationwide. We believe this bill is important for opening up opportunities to consumers who currently do not have access to solar. It is an important part of the overall clean economy in the state of Nevada. I would also like to echo the comments of Rose McKinney-James about the benefits of solar when talking about the costs. We are here in support of the bill and to answer any questions.

**Kyle J. Davis, representing Nevada Conservation League:**

We are here in support of S.B. 392 (R2) and want to thank Senator Denis for bringing the bill forward and all the work that he put in on the Senate side to get it into the form that you see in front of you today. Certainly you have heard a lot of testimony talking about some of the gaps we have seen as we have developed our renewable energy economy in this state, and I think this bill does a pretty good job of trying to ensure that all sectors of our economy have access to solar so that everyone has the opportunity to take advantage of it. We would encourage your support.

**Assemblyman Daly:**

I have a question for Rose McKinney-James and Tom Polikalas. When Mr. Polikalas was talking about the national security, if everyone who is really passionate about this wants it and we have 100 percent, everyone is on renewable energy and batteries and various things and there is no grid, I am not sure how that helps our national security.

Ms. McKinney-James was talking about Valley Electric, which I understand is a co-op and not subject to this law at all. I suppose that is why they can have a 15-megawatt rather than a 12-megawatt system. Are they covered by any of this? When they are doing their megawatts, they own it and they have their own people who are within their area do it, so someone else is not able to come into Valley Electric's area and basically compete with them and then whatever extra energy they produce, Valley Electric does not have to buy it from them as it has to be on the regulated side of the industry. Is that correct?

**Rose McKinney-James:**

The Valley Electric system is indeed confined within their service territory. I was using it as an example of a community solar effort and, in particular, I wanted to point out the fact that they were also interested in attaching batteries or some sort of storage capacity to the project to address intermittency. You are correct; they have a separate governance structure and they are not subject to this measure. This is another indication, recognizing that they are situated in a county that is amongst the poorest of the counties in the state. They have seen the wisdom of finding a way to aggregate the ability to provide these resources to their members. I was using that as an example. Then the competition comes in terms of who is able to take advantage of the contracts associated with providing the resource—the panels, the inverters, and all the other economic aspects of a solar project.

**Assemblyman Daly:**

The community solar garden does not have a separate owner, and someone could not come in and set it up in Sierra Pacific's service area. Only you can provide power within that area?

**Rose McKinney-James:**

That is correct. For Valley Electric, it is within their service territory. For this proposal, it would be for those who are probably within either the Sierra Pacific or Nevada Power service territory.

**Assemblyman Daly:**

I am just pointing out that the example you gave is not the same as how Sierra Pacific would have to do it. Back to my question, if we are not on the national grid, if we are back to 100 percent and everyone is on this and no one else is producing power, who is going to pay these ratepayers back for the excess energy? Remember that no one else is creating power. Who is going to pay those subsidies? Who is going to pay the amount back to the person for the excess power they created?

**Tom Polikalas:**

I think as you look at the possible scenario of everyone going to community solar array, you would also then have the concept of Nevada being completely independent in terms of power generation. We would not be importing any natural gas, and we would not be importing anything else. That is an interesting situation to contemplate. Also going to the penetration over time, when you look at what may transpire in 2030 or 2040 because of technological advances, in that interim period, we also advocate for the electrification of transportation, building demand with ground-source heat pumps, and having electric demand overall grow through economic development so you have more of a slow growth and slow penetration so there are benefits that accrue over time.

The ultimate scenario when everyone is on self-generation has been described by some analysts, and in that case it becomes that essentially we have our fixed costs covered in the base charge. Right now we are paying about \$15 per month. From what I have read currently, the distribution system nationwide costs about \$180 a year per customer, so a \$15 per month base charge is in the ballpark of covering those costs. We are in the ballpark of having a scenario in which Nevada is energy independent, and I think that would be good for our overall economy.

**Assemblyman Daly:**

Is that a \$15 base charge you are talking about in this bill?

**Tom Polikalas:**

It is within what exists now for our billing system and in the purview of the Public Utility Commission of Nevada.

**Assemblyman Daly:**

When I generate electricity and I pay it out and everyone is off and there is no power generation from anyone else, who is paying for the excess energy that I made? No one?

**Tom Polikalas:**

If you are connected to the grid . . .

**Assemblyman Daly:**

No, there is no grid. Why do I need the grid? I am on solar, I am on battery, and so is everyone else in the state.

**Chair Bustamante Adams:**

You have to be connected to the grid, Assemblyman Daly.

**Tom Polikalas:**

Correct.



**Assemblyman Brooks:**

I want to clarify something. You brought up a community solar project that already exists, and I believe that is owned by a third-party group of investors. Is that correct?

**Rose McKinney-James:**

Yes, that is my understanding.

**Assemblyman Brooks:**

I believe it was also built using 100 percent union labor from 100 percent Nevada companies. Is that correct?

**Rose McKinney-James:**

That is correct.

**Assemblyman Brooks:**

I also believe it used all American-made components and steel in the project. Is that correct?

**Rose McKinney-James:**

I believe you are correct, yes.

**Assemblyman Brooks:**

My understanding—and this might be for the people at the table—is that this bill we are currently talking about is for utility ratepayers who currently pay a utility rate, and it is capped at a certain amount of megawatts. We are not talking about making 100 percent of the state's energy with this bill, and we are talking about all the participants in this program paying all of the same fixed costs that any other ratepayer would pay. Is that correct?

**Rose McKinney-James:**

Yes, it is.

**Assemblyman Brooks:**

Thank you for clarifying that for me.

**Chair Bustamante Adams:**

I know that Assemblywoman Neal was not here as she was in the Senate presenting a bill, and she has a question on sections 13 and 15.

**Assemblywoman Neal:**

It was the part in section 13 where it states: "A utility shall purchase unsubscribed electricity . . . at the rate offered for short-term purchases . . . ." I was trying to figure out what the rate is for short-term purchases.

**Christopher Mixson:**

Unfortunately, I do not know what the exact rate is for short-term purchases. My understanding is that under both federal and state law, the short-term rate for qualified facilities is the lowest rate that the utility is allowed to pay for electricity. It is the lowest possible rate that the utility could pay for electricity generated.

**Assemblywoman Neal:**

Section 14 addresses the portfolio energy credits that are supposed to be created based on this type. Would you explain how that is going to work? I understand it one way, and I do not understand how it works in this context.

**Christopher Mixson:**

Basically, section 14 says that community solar gardens are allocated portfolio energy credits for the solar power they produce in Nevada and that those portfolio energy credits will be owned by the subscriber organization that owns the community solar garden.

**Assemblywoman Neal:**

That is what I am confused about. There are multiple people, so how does the ownership work and how is it allocated?

**Christopher Mixson:**

It is owned wholly by the subscriber organization that owns the community solar garden.

**Assemblywoman Neal:**

So the people who are actually a part of the community solar group, is there anything that gets passed down to them in regard to the credits?

**Christopher Mixson:**

No, I do not think so. My understanding is that under existing regulations for rooftop solar, to the extent a rooftop solar customer uses the renewable generation incentives—which I think is most of them—they also do not own the portfolio energy credits that are applicable to their rooftop solar generation.

**Chair Bustamante Adams:**

We are going to go to those in opposition.

**Judy Stokey, Vice President, Government and Community Strategy, NV Energy:**

I am here in opposition of this bill. I was neutral on the other side, but I know from being in this Committee before that when I have concerns on a bill, Chair Bustamante Adams, you like us to go in opposition. I wanted to put a couple of things on the record. We have a large renewable fleet, and we are very proud of that. NV Energy administers a low-income and a public building solar incentive program which is in a bill that is going through this process right now, and it will extend the program for another six years at \$1 million per year.

We currently have over 300 schools and nonprofits that have solar rooftops, and they have received over \$100 million of customer money for incentives. We participate in all sectors of the community.

As you know, a bill that came out of this House, Assembly Bill 223, has at least 5 percent of our energy efficiency budget which will go to low income. We also have a subscription solar program that we have in front of the PUCN right now to see if we can get that approved. It is basically a large project, and we partition out a certain portion of it so we can offer it to people who cannot have solar on their home for one reason or another or if they are in an apartment complex. We are going to offer that to residents if the PUCN decides that it is a good program.

Finally, without further financial impact studies, S.B. 392 (R2), in aggregate with all of the other energy bills that are going through this process, leads to serious concerns as to whether or not this is the right thing to do for Nevada right now in light of the energy choice initiative that is going to be voted on next year.

**Ernest E. Adler, representing the International Brotherhood of Electrical Workers, Local 1245:**

I want to thank Senator Denis for making this a much better bill than it was on the other side. We are fundamentally opposed to this because the choice is not between a solar garden and a coal plant or a solar garden and a gas plant. This choice is between a solar garden and a commercial solar plant. That is the tradeoff. The benefits to the solar garden is community-based; the community becomes involved with the whole generation of panels, and it benefits a lot of poor people. You can generate a lot more energy for a lot less money with a large commercial plant that would benefit all ratepayers, not just the people who are subscribed to the solar garden, which we think is a major benefit.

Just from a union perspective, a large commercial solar plant is much more likely to be built by union labor and maintained by union labor once it is built, and that is one of the main reasons we are for building large commercial solar fields and not building solar gardens. What you have is a cultural choice between the two models.

I think one of the other things in this bill that is a flaw is that it was modeled after Colorado and Minnesota. There is really nothing in here that prevents a small casino from being a subscriber organization and receiving many of the benefits from this bill. It would be nice if it were limited to churches, schools, and community organizations, but it really is not. It can be utilized by other entities that are not as altruistic and not necessarily 501(c)(3) organizations. That is what we see it as: a choice between a large energy-efficient solar commercial facility and solar gardens.

**Chair Bustamante Adams:**

If the bill was restricted so that a small casino would not be considered, would that move you to be a supporter, or would you still be in opposition?

**Ernest Adler:**

Probably more towards neutral.

**Danny Thompson, representing International Brotherhood of Electrical Workers, Local 396 and Local 1245:**

I have the same concerns that Mr. Adler has. For the record, I think it is important that you know that currently NV Energy has over 1,000 megawatts of solar in the rate. If you go to the El Dorado Valley in southern Nevada and on your way out towards Primm, you will see these large utility-grade solar installations. The reality is that everyone in Nevada is getting a mix of solar in their rates.

The answer to your earlier question, Chair Bustamante Adams, is that we would prefer it was clarified that a small casino—12 megawatts is a lot of power—could not set up one of these things and then be subsidized by other ratepayers. It is our concern that that could happen. In addition, the subsidies that are in this bill and in other bills—our concern is that with Question 3 on the ballot, a constitutional amendment that passed overwhelmingly at the last election will automatically be on the ballot in 2018. Should that pass, NV Energy would have to divest itself of its generation, they would be a wires-only company, and then they would not be the carrier of last resort. If your power goes off under the terms of this thing, you would not call NV Energy. You would call someone else, which would be whoever you are buying your power from. All of these things give us concern about this bill in its current form. If there is no one to pay the subsidies, none of these things will work. For those reasons, we are opposed to this bill.

**Chair Bustamante Adams:**

Is there anyone else in opposition? [There was no one.] Is there anyone in neutral?

**Garrett C. Weir, General Counsel, Public Utilities Commission:**

The purpose of my testimony this evening is simply to note that the version of this bill that passed out of the Senate—the second reprint—still imposes a fiscal impact on the PUCN. However, the proposed amendment that was discussed earlier would, in our opinion, remove the fiscal impact. We wanted to state that for the record.

**Chair Bustamante Adams:**

Thank you for putting that on the record. Are there any questions for the PUCN from the Committee members? [There were none.] Senator Denis, do you have any closing remarks before we adjourn the hearing?

**Senator Denis:**

You have heard a lot of different solar things—you have the huge arrays that are the utility-scale solar, you have the rooftop solar, and this is the middle piece. You are able to build these and people feel a connection in a community to be able to do that. I think we have put in place some things that make it a really good bill and a good option for those who do not have the ability to have solar. I appreciate the opportunity to present the bill.

[([Exhibit G](#)), ([Exhibit H](#)), ([Exhibit I](#)), ([Exhibit J](#)), ([Exhibit K](#)), and ([Exhibit L](#)) were submitted but not discussed.]

**Chair Bustamante Adams:**

I will close the hearing on S.B. 392 (R2). Is there anyone here for public comment? [There was no one.] We will stand in recess upon the call of the Chair [at 6:43 p.m.].

[The meeting resumed at 7:55 p.m. and adjourned at 7:55 p.m.].

RESPECTFULLY SUBMITTED:

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Kathryn Keever  
Recording Secretary

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Linda Whimple  
Transcribing Secretary

APPROVED BY:

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Assemblywoman Irene Bustamante Adams, Chair

DATE: \_\_\_\_\_

## EXHIBITS

[Exhibit A](#) is the Agenda.

[Exhibit B](#) is the Attendance Roster.

[Exhibit C](#) is the Work Session Document for Senate Bill 498 (3rd Reprint) dated June 1, 2017, presented by Kelly Richard, Committee Policy Analyst, Research Division, Legislative Counsel Bureau.

[Exhibit D](#) is a letter dated June 1, 2017, in support of Senate Bill 392 (2nd Reprint), to the Assembly Committee on Commerce and Labor, submitted by community members of southern Nevada.

[Exhibit E](#) is Proposed Amendment 5274 to Senate Bill 392 (2nd Reprint), presented by Christopher W. Mixson, representing Vote Solar.

[Exhibit F](#) is written testimony, submitted by Iridane Sanchez, Private Citizen, North Las Vegas, Nevada, in support of Senate Bill 392 (2nd Reprint).

[Exhibit G](#) is written testimony submitted by Dr. Robert Fowler, Pastor, Victory Missionary Baptist Church, dated June 1, 2017, in support of Senate Bill 392 (2nd Reprint).

[Exhibit H](#) is written testimony submitted by Naomi Lewis, Private Citizen, Las Vegas, Nevada, in support of Senate Bill 392 (2nd Reprint).

[Exhibit I](#) is written testimony submitted by Emily Persaud Zamora, Private Citizen, Las Vegas, Nevada, in support of Senate Bill 392 (2nd Reprint).

[Exhibit J](#) is written testimony authored by Roxann McCoy, President, National Association for the Advancement of Colored People, dated June 2, 2017, in support of Senate Bill 392 (2nd Reprint).

[Exhibit K](#) is a graphic depiction prepared by Coalition for Community Solar Access, titled "How Does Community Solar Work?" submitted by Isabelle Beaumont-Frenette, Director of Communications, Carrara Nevada, in relation to Senate Bill 392 (2nd Reprint).

[Exhibit L](#) is a document titled "Clean Energy and Environmental Laws as Human Rights Protections," dated May 7, 2017, in support of Senate Bill 392 (2nd Reprint), authored and submitted by Janette Dean, Private Citizen, Reno, Nevada.