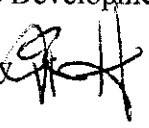


**MEMORANDUM**

June 8, 2018

TO: Planning, Housing and Economic Development Committee

FROM: Josh Hamlin, Legislative Attorney 

SUBJECT: Bill 15-18, Economic Development – Workforce Development – Green Jobs Apprenticeship Program

PURPOSE: Worksession – Committee should make recommendations on Bill

Bill 15-18, Economic Development – Workforce Development – Green Jobs Apprenticeship Program, sponsored by Lead Sponsor Councilmember Huckler and Co-Sponsors Councilmembers Leventhal, Elrich, Rice, Council Vice President Navarro and Councilmembers Katz and Berliner, was introduced on April 17. A public hearing was held on May 15.

Bill 15-18 would:

- provide that the County's Workforce Development Corporation must administer a clean energy industry pre-apprenticeship job training program; and
- establish certain criteria for the operation of the pre-apprenticeship job training program.

A memorandum from lead sponsor Councilmember Huckler is at ©5-6.

**Background**

Under County Code Chapter 30B, Economic Development, the County is empowered to designate a nonprofit corporation as the County's Workforce Development Corporation to implement the County's workforce development policies. Worksource Montgomery, Inc., has been so designated, and has as its mission: (1) to meet the talent attraction, development, and retention needs of strategic industries; (2) to meet the needs of the underemployed and unemployed; and (3) to develop career pathways that lead to sustainable wage jobs and support a thriving mission.<sup>1</sup>

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<sup>1</sup> This mission is consistent with the Policy Objectives of the County Workforce Development Corporation set forth in §30B-8.

Bill 15-18 would require WorkSource Montgomery to include in its workforce development programs a clean energy industry pre-apprenticeship job training program, and would establish certain criteria for the operation of the pre-apprenticeship job training program. The program would prepare graduates for apprenticeships for skilled work related to renewable energy, energy efficiency and storage, resource conservation, environmental protection, and advanced transportation.

### **Public Hearing**

Four people testified at the public hearing on May 15; all supported the Bill. Crystal Ruiz of Washington Suburban Sanitary Commission indicated that WSSC is addressing the challenge of an aging workforce, and said that the legislation would create a pipeline of middle-skilled workers for WSSC. Michal Freedman of the Sierra Club of Montgomery County said that the transition to a clean, renewable energy system will create opportunities for new jobs, and Bill 15-18 will help to ensure that there are sufficient workers to fill those jobs. George Escobar of CASA mentioned that CASA has provided popular green economy job training courses, such as solar panel installation and sustainable landscaping, and offered CASA's assistance in pursuing the Bill's initiative. Jeff Guido of C.H.O.I.C.E., an office of North America's Building Trades Unions in the greater Baltimore/Washington, DC/Northern Virginia region, stated that green energy jobs represent an important part of the present and future economy, and that there are 1,200 contractors ready to participate in an apprenticeship training program.

### **Issues for Committee Discussion**

#### **1. What are "green jobs?"**

Bill 15-18 would require Worksource Montgomery, as the County's Workforce Development Corporations, to administer a pre-apprenticeship program to prepare individuals for apprenticeship<sup>2</sup> in the "clean energy and environment industry." Jobs in this industry – green jobs – are defined in the Bill as jobs related to:

- renewable energy;
- energy efficiency;
- energy storage;
- resource conservation;
- environmental protection; and
- advanced transportation.

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<sup>2</sup> The program required under Bill 15-18 would have to prepare workers for "an apprenticeship program registered by the Maryland Apprenticeship and Training Council." The Maryland Apprenticeship and Training Council (MATC) is a twelve-member body established pursuant to the State's Apprenticeship and Training Law and Regulation. The MATC formulates apprenticeship policies, registers standards and agreements, determines which skilled trades are apprenticeable, and formulates and adopts standards of apprenticeship that safeguard the welfare of all apprentices. Five members of the Council represent employee organizations (one of which must be an employee), five represent employers, and two are appointed from the general public. Three additional members serve on the Council in a non-voting, consultant capacity.

The “green economy” has been recognized as a desirable and growing employment sector, due to this increased emphasis on energy conservation in the building and transportation industries and the fact the jobs are largely anchored to the area in which the work is done. A 2009 report of the White House Task Force on the Middle Class put it succinctly:

Green jobs have the potential to be quality, family-sustaining jobs that also help improve our environment. They are largely domestic jobs that can't be offshored. They tend to pay more than other jobs, even controlling for worker characteristics. Moreover, green jobs are an outgrowth of a larger movement to reform the way we create and use energy in both this country and the rest of the world. They represent a growth sector, and one that offers the dual promise of providing good jobs while meeting the environmental challenge to reduce our dependence on finite fossil fuels that generate harmful carbon emissions.<sup>3</sup>

Economists and industry analysts have for some time predicted a surge in demand for skilled craft labor, as baby boomers retire and construction spending has risen significantly. This projected shortage of skilled workers has materialized in the construction industry, generally.<sup>4</sup> Hiring green-skilled workers has been identified as particularly challenging, and outreach and education have been identified as key components of a strategy to attract new workers to fill the shortage.<sup>5</sup> A pre-apprenticeship program, as would be required under Bill 15-18, would serve this purpose.

## **2. How would the pre-apprenticeship program work?**

Generally, a “pre-apprenticeship” program is a workforce training program that prepares participants to apply for, enter and successfully complete a building trades apprenticeship program.<sup>6</sup> The U.S. Department of Labor defines a pre-apprenticeship as a program or set of strategies designed to prepare individuals to enter and succeed in a Registered Apprenticeship program and has a documented partnership with at least one, if not more, Registered Apprenticeship program(s).<sup>7</sup> An example of a pre-apprenticeship curriculum is the Multi-Craft Core Curriculum of the Building and Trades Department, AFL-CIO.<sup>8</sup> The curriculum includes courses that are included in all building trades’ apprenticeship programs, which are offered in common in preparation of specialization in a particular craft.

## **3. What would the fiscal impact of the program be?**

In the Fiscal Impact Statement, the Office of Management and Budget (OMB) anticipates that there would be no change to County expenditures required to implement Bill 15-18. The basis for this projection is an assumption of total annual expenditures on the program of between

<sup>3</sup> [https://digitalcommons.ilr.cornell.edu/cgi/viewcontent.cgi?article=1743&context=key\\_workplace](https://digitalcommons.ilr.cornell.edu/cgi/viewcontent.cgi?article=1743&context=key_workplace)

<sup>4</sup> <https://www.curbed.com/2018/1/23/16910310/construction-homebuilding-labor-shortage-jobs-vocational-training>

<sup>5</sup> <https://www.usgbc.org/Docs/Archive/General/Docs18984.pdf>

<sup>6</sup> <http://www.choiceworks.org/Members-and-Apprenticeship/Multi-Craft-Core-Curriculum-and-Pre-Apprenticeship>

<sup>7</sup> [https://wdr.doleta.gov/directives/attach/TEN/TEN\\_13-12.pdf](https://wdr.doleta.gov/directives/attach/TEN/TEN_13-12.pdf)

<sup>8</sup> <http://www.choiceworks.org/CHOICE/media/BTCD/Project%20Labor%20Agreements/Multi-craft-Core-BROCHURE.pdf?ext=.pdf>

\$10,000 and \$17,500, and the expectation that WSM would work with contractor and industry partners to pursue grant or sponsorship funding to offset these costs (see ©8 page 1 of FIS). The Department of Finance anticipates that Bill 15-18 is likely to have a positive economic impact on employment in the County, based on increasing demand for “green” jobs (see ©12 page 3 of EIS).

Possible funding sources include the Maryland Employment Advancement Right Now program, a competitive workforce development grant program administered by the Department of Labor, Licensing and Regulation.<sup>9</sup> Also, there are likely to be continued legislative efforts in Annapolis to establish another potential State funding source through the Strategic Energy Investment Fund.<sup>10</sup> There may be additional sources of funding available from the federal government as well as the private sector. Council should be aware, however, that outside funding is not guaranteed. If WSM cannot secure outside funds to fully cover the cost of the program, it may need an additional appropriation or, alternatively, may need to charge participants a fee to offset the program costs.

This packet contains:	<u>Circle #</u>
Bill 15-18	1
Legislative Request Report	4
Councilmember Hucker memorandum	5
Fiscal and Economic Impact statement	7
Public Hearing testimony	
Crystal Ruiz, WSSC	14
Michal Freedman, Sierra Club Montgomery County	15
George Escobar, CASA	16

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<sup>9</sup> <https://www.dlrl.state.md.us/earn/>

<sup>10</sup> The most recent annual report of the activities of the SEIF, which provides a good overview of how the Fund works, can be found at:  
<http://energy.maryland.gov/Documents/2017%20Maryland%20Strategic%20Energy%20Investment%20Energy%20Fund%20Report%20FINAL.pdf>

Bill No. 15-18  
Concerning: Economic Development –  
Workforce Development – Green  
Jobs Apprenticeship Program  
Revised: April 12, 2018 Draft No. 4  
Introduced: April 17, 2018  
Expires: October 17, 2019  
Enacted: \_\_\_\_\_  
Executive: \_\_\_\_\_  
Effective: \_\_\_\_\_  
Sunset Date: None  
Ch. \_\_\_\_\_, Laws of Mont. Co. \_\_\_\_\_

## COUNTY COUNCIL FOR MONTGOMERY COUNTY, MARYLAND

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Lead Sponsor: Councilmember Hucker  
Co-Sponsors: Councilmembers Leventhal, Elrich, Rice, Council Vice President Navarro and  
Councilmembers Katz and Berliner

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**AN ACT** to:

- (1) provide that the County's Workforce Development Corporation must administer a clean energy industry pre-apprenticeship job training program;
- (2) establish certain criteria for the operation of the pre-apprenticeship job training program; and
- (3) generally amend County law related to workforce development.

By amending

Montgomery County Code  
Chapter 30B, Economic Development  
Article II, Workforce Development  
Section 30B-12

<b>Boldface</b>	<i>Heading or defined term.</i>
<u>Underlining</u>	<i>Added to existing law by original bill.</i>
[Single boldface brackets]	<i>Deleted from existing law by original bill.</i>
<u>Double underlining</u>	<i>Added by amendment.</i>
[[Double boldface brackets]]	<i>Deleted from existing law or the bill by amendment.</i>
* * *	<i>Existing law unaffected by bill.</i>

*The County Council for Montgomery County, Maryland approves the following Act:*



28 (1) is designed to prepare individuals to enter and succeed in an  
 29 apprenticeship program registered by the Maryland  
 30 Apprenticeship and Training Council; and

31 (2) includes:

32 (A) training and curriculum that prepares participants with the  
 33 skills and competencies to enter one or more of the  
 34 Maryland-registered apprenticeship programs that prepare  
 35 workers for careers in the clean energy and environment  
 36 industry, including jobs related to:

- 37 (i) renewable energy;
- 38 (ii) energy efficiency;
- 39 (iii) energy storage;
- 40 (iv) resource conservation;
- 41 (v) environmental protection; and
- 42 (vi) advanced transportation;

43 (B) a documented strategy for increasing apprenticeship  
 44 opportunities for underemployed and unemployed  
 45 individuals; and

46 (C) rigorous performance and evaluation methods to ensure  
 47 program efficacy and continuous improvement.

48 (d) The Workforce Development Corporation’s Board and staff must meet  
 49 with the Executive, the Council, and the Workforce Development Board  
 50 at least annually regarding the Workforce Development Corporation’s  
 51 activities and finances.

## LEGISLATIVE REQUEST REPORT

Bill 15-18

*Economic Development – Workforce Development – Greens Jobs Apprenticeship Program*

**DESCRIPTION:** The Bill would provide that the County's Workforce Development Corporation must administer a clean energy industry pre-apprenticeship job training program and establish certain criteria for the operation of the pre-apprenticeship job training program.

**PROBLEM:** The growing "green economy" will be needing more trained workers in coming years.

**GOALS AND OBJECTIVES:** Establish a workforce development program to prepare graduates for apprenticeships for skilled work related to renewable energy, energy efficiency and storage, resource conservation, environmental protection, and advanced transportation.

**COORDINATION:** Worksource Montgomery

**FISCAL IMPACT:** To be requested.

**ECONOMIC IMPACT:** To be requested.

**EVALUATION:** To be requested.

**EXPERIENCE ELSEWHERE:** To be researched.

**SOURCE OF INFORMATION:** Josh Hamlin, Legislative Attorney, 240-777-7892

**APPLICATION WITHIN MUNICIPALITIES:** To be researched.

**PENALTIES:** None.





**MONTGOMERY COUNTY COUNCIL**  
ROCKVILLE, MARYLAND

TO: Councilmembers  
FROM: Councilmember Tom Hucker  
DATE: January 31, 2018  
RE: Clean Energy Apprenticeship Readiness Program Bill

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Enclosed for your review is draft legislation that would establish a new clean energy industry apprenticeship readiness program (ARP) within Worksource Montgomery. I would be honored if you would consider cosponsoring this bill.

I worked closely with Dr. Ellie Giles of Worksource Montgomery (WSM) and Jeff Guido, the Maryland Field Representative for Community Hub for Opportunities in Construction Employment<sup>1</sup> in crafting this bill, which they both enthusiastically support. What we would be establishing, through Dr. Giles at WSM, would be a new County job training program geared at preparing our underemployed and unemployed, youth and transitioning adults, for success in Maryland Apprenticeship Training Council (MATC)<sup>2</sup>-registered apprenticeship programs and eventual long-term employment in the clean energy construction industry. A key aspect of this type of program is that it is typically accompanied by direct hiring agreements with local construction employers, giving successful program graduates a clear path to a solid, middle class career.

This training program would encompass work related to: renewable energy, energy efficiency and storage, resource conservation, environmental protection and advanced transportation. Specifically, this program would prepare graduates for jobs working on solar systems, green roofs (as are currently being incorporated into some of our public schools), geothermal systems, rainwater catchments, pervious pavement, building thermal walls, wind, natural gas, sewer treatment and work with other types of environmental technology that will improve on these and other renewable sources.

As you know we have significant development scheduled for the coming years in County buildings, schools, in many neighborhoods surrounding the Purple Line, downtown Wheaton and White Oak, all of which will have a significant focus on utilizing renewable sources of energy in construction. This is the opportune time to establish a local job training program in the clean

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<sup>1</sup> C.H.O.I.C.E., which is part of the North American Building Trades Unions (NABTU).

<sup>2</sup> MATC is a body within the Division of Workforce Development and Adult Learning of Maryland's Department of Labor, Licensing & Regulation (DLLR) and is responsible for formulating apprenticeship policies and registering statewide standards and agreements.

energy industry, ensuring that our workforce reaps the maximum benefit from new construction jobs in these “green” areas. This would also be an excellent way to continue to follow through on the Council’s historic down payment on the achievement gap by providing a new career advancement opportunity for students seeking opportunities outside of traditional classroom settings, which our MCPS Superintendent is supportive of. I also believe that this program could serve as a needed boost to our citizens returning from incarceration by providing them with a new avenue to pursue job training and placements.

Typical requirements for acceptance for these programs in other jurisdictions are:

- 1) proof of County residency;
- 2) proof of having acquired at least a ninth grade math and reading level (in contrast with other programs requiring a G.E.D. or high school diploma); and,
- 3) passing a drug test.

I note that the County there are already some apprenticeship and apprenticeship readiness programs available through MCPS and Montgomery College. However, this type of accredited clean energy construction industry oriented program is not currently offered anywhere. The apprenticeship programs offered by Montgomery College are paid for by the student, are not recognized by MATC and generally do not provide a clear path to this kind of employment. Montgomery College apprenticeship programs are currently limited to traditional construction trades, like carpentry and HVAC systems, and do not include anything close to this caliber in renewable energy construction.

Finally, with respect for the funding for this new County initiative, Dr. Giles and Mr. Guido have expressed confidence that WSM could compete successfully for State Employment Advancement Right Now (EARN) program<sup>3</sup> funding as well as federal funds, project labor management funds, funding from private foundations and other sources to support the ARP in the future.<sup>4</sup>

Please let me or Andrea Nunez in my office if you would like to cosponsor this legislation, or if you have any questions. Thanks.

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<sup>3</sup> Administered through the State’s Department of Labor, Licensing and Regulation (DLLR): <https://www.dllr.state.md.us/earn/>

<sup>4</sup> In the 2018 legislative session, C.H.O.I.C.E will again pursue legislation to establish an additional dedicated source of state funding for this kind of program from the state’s existing Strategic Energy Investment Fund.



ROCKVILLE, MARYLAND

MEMORANDUM

May 21, 2018

TO: Hans Riemer, President, County Council

FROM: Jennifer A. Hughes, Director, Office of Management and Budget *JAH*  
Alexandre A. Espinosa, Director, Department of Finance *AE*

SUBJECT: FEIS for Bill 15-18 - Economic Development - Workforce Development - Green Jobs Apprenticeship Program

Please find the attached fiscal and economic impact statements for the above-referenced legislation.

JAH:mc

cc: Bonnie Kirkland, Assistant Chief Administrative Officer  
Lisa Austin, Offices of the County Executive  
Joy Nurmi, Special Assistant to the County Executive  
Lilly Qi, Assistant Chief Administrative Officer  
Patrick Lacefield, Director, Public Information Office  
David Platt, Department of Finance  
Robert Hagedoorn, Department of Finance  
Dennis Hetman, Department of Finance  
Ellie Giles, WorkSource Montgomery  
Deborah Lambert, Office of Management and Budget  
Jennifer Bryant, Office of Management and Budget  
Pofen Salem, Office of Management and Budget  
Felicia Zhang, Office of Management and Budget

## Fiscal Impact Statement

### Bill 15-18

#### 1. Legislative Summary

Bill 15-18 would direct WorkSource Montgomery (WSM) to explore a clean-energy pre-apprenticeship job training program and pursue implementation through a Maryland Department of Labor, Licensing and Regulation (DLLR) eligible training provider.

2. An estimate of changes in County revenues and expenditures, regardless of whether the revenues or expenditures are assumed in the recommended or approved budget. Includes source of information, assumptions, and methodologies used.

It is anticipated that there would be no change to County expenditures required to implement Bill 15-18. WSM's experiences with other pre-apprenticeship programs estimates that training and supports typically run \$500-\$700 per participant depending on determined career pathway, skill levels, and employment barrier support needs. The program costs would include training tuition, training materials, and supportive services; such as transportation or child care as needed. Based on the capacity of WSM to fundraise for the program, it is anticipated that WSM could serve 20-25 participants. Based on these assumptions, total annual expenditures range from \$10,000 to \$17,500.

WSM would collaborate with the contractor and industry partners to pursue grant or sponsorship funding to offset any tuition costs. Based on WSM's experiences with other programs, total revenues from outside funding will range from \$10,000 to \$17,500 and will cover the total annual expenditures for the program.

3. Revenue and expenditure estimates covering at least the next 6 fiscal years.

Based on the assumptions provided in #2, the estimated expenditures and revenues for the next six years range from \$60,000 to \$105,000.

4. An actuarial analysis through the entire amortization period for each bill that would affect retiree pension or group insurance costs.

None.

5. An estimate of expenditures related to County's information technology (IT) systems, including Enterprise Resource Planning (ERP) systems.

None.

6. Later actions that may affect future revenue and expenditures if the bill authorizes future spending.

Bill 15-18 does not authorize future spending.

7. An estimate of the staff time needed to implement the bill.

No County staff are required to implement the bill.

8. An explanation of how the addition of new staff responsibilities would affect other duties.

Not Applicable.

9. An estimate of costs when an additional appropriation is needed.

Not Applicable.

10. A description of any variable that could affect revenue and cost estimates.

The size of cohorts, expansiveness of training, funding resources, and job-placement capabilities are variables that could affect revenue and cost estimates.

11. Ranges of revenue or expenditures that are uncertain or difficult to project.

There are a wide range of occupations that might be demanded from employers. Employer demand for certain occupation, may create an increase in revenue and expenditures required for the program.

12. If a bill is likely to have no fiscal impact, why that is the case.


Funding from other sources will be pursued to support the requirements of Bill 15-18.

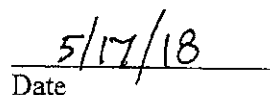
13. Other fiscal impacts or comments.

None.

14. The following contributed to and concurred with this analysis:

Ellie Giles, WorkSource Montgomery  
Lilly Qi, Assistant Chief Administrative Officer  
Deborah Lambert, Office of Management and Budget  
Jennifer Bryant, Office of Management and Budget

  
Jennifer A. Hughes, Director  
Office of Management and Budget

  
Date

**Economic Impact Statement**  
**Bill 15-18, Economic Development – Workforce Development – Green Job**  
**Apprenticeship Program**

**Background:**

The Bill would:

- provide that the County's Workforce Development Corporation must administer a clean energy industry pre-apprenticeship job training program, and
- establish certain criteria for the operation of the pre-apprenticeship job training program.

Bill 15-18 amends Section 30B-12 to include in the Workforce Development Program a pre-apprenticeship job training program that prepares individuals to enter and succeed in an apprenticeship program that includes jobs related to renewable energy, energy efficiency, energy storage, resource conservation, environmental protection, and advanced transportation.

**1. The sources of information, assumptions, and methodologies used.**

Sources of information include the Bureau of Labor Statistics (BLS), U.S. Department of Labor, and the Environmental and Energy Study Institute. The Department of Finance made no assumptions or developed methodologies in the preparation of the economic impact statement.

According to BLS, green jobs are either:

- Jobs in businesses that produce goods or provide services that benefit the environment or conserve natural resources, and
- Jobs in which workers' duties involve making their establishment's production processes more environmentally friendly or use fewer natural resources.

BLS also identifies each type of green job in businesses that produce goods and services that benefit the environment or conserve natural resources. Green goods and services fall into five groups:

- Energy from renewable sources,
- Energy efficiency,
- Pollution reduction and removal, greenhouse gas reduction, and recycling and reuse,
- Natural resources conservation, and
- Environmental compliance.

Another group of jobs involves workers' duties making their establishment's production more environmentally friendly or use fewer natural resources. This group

**Economic Impact Statement**  
**Bill 15-18, Economic Development – Workforce Development – Green Job**  
**Apprenticeship Program**

of workers research, develop, or use technologies and practices to lessen the environmental impact.

The last report on this topic prepared by BLS in March 2013 used data on employment in green jobs and services from 2011. According to that report, the percent of total employment associated with the production of Green Goods and Services (GGS) increased by 0.1 percentage point to 2.6 percent. The number of GGS jobs increased by 157,746 in 2011 to over 3.4 million. GGS employment accounted for 2.3 percent of private sector jobs, while the public sector had nearly 890,000 GGS jobs. According to the 2011 report, GGS jobs were found in businesses that primarily produce goods and provide services that benefit the environment or conserve natural resources.

Data provided by BLS for the State of Maryland in the March 2013 report showed that GGS employment in all industries increased 0.6 percent from 2010 to 2011. The largest percentage increase occurred in the construction industry (↑6.0 percent) and the second largest increase occurred in the professional, scientific, and technical services industries (↑1.1 percent). What the data also showed was a decrease in employment in the administrative and waste services sector (↓0.3 percent). That decline was nearly the same as the decrease of 0.2 percent at the national level.

Since the elimination of the Green Careers program at BLS in March 2013 due to sequestration attributed to the *Balanced Budget and Emergency Deficit Control Act*, neither this program nor the collection of data has been resumed. However, organizations such as the Environmental and Energy Study Institute have provided some recent data on “green jobs” in the United States. In its fact sheet, dated February 2017, it reports that the U.S. Energy and Employment Report (USEER) found that the energy efficiency industry directly employed nearly 2.2 million in the green appliance and green building subsectors. USEER also states that the energy efficiency sector predicted a growth rate of between 9 and 11 percent in 2017. According to USEER, the U.S. renewable energy industry provided nearly 680,000 jobs during the first quarter of 2016.

While the compilation of GGS employment was eliminated in March 2013, BLS provides employment projections for environmentally focused occupations. For example, in its April 2018 report titled “Green growth: Employment projections in environmentally focused occupations”, the projection of new jobs between 2016 and 2026 are as follows:

- Solar photovoltaic installers: 11,800
- Environmental scientists and specialists, including health: 9,900
- Hazardous material removal workers: 7,900
- Wind turbine service technicians: 5,600
- Environmental engineers: 4,500
- Environmental science and protection technicians, including health: 4,200

**Economic Impact Statement**  
**Bill 15-18, Economic Development – Workforce Development – Green Job**  
**Apprenticeship Program**

- Environmental engineering technicians: 2,200
- Conservation scientists: 1,400

The report also states that BLS projects two occupations that have the fastest employment growth, i.e., “green work”, which are solar photovoltaic installers (105 percent increase) and wind turbine service technicians (96 percent increase). According to BLS, the data also show that these occupations had a median annual wage that was higher than the \$37,690 median wage for all workers in 2017.

Workers in green occupations focus on the environment in different ways from those occupations that build and maintain systems that create energy from renewable sources, to occupations that remediate polluted sites, to occupations that advise organizations or individuals in ways to protect and preserve natural resources.

**2. A description of any variable that could affect the economic impact estimates.**

The variable that could affect the economic impact estimates are the demand for total GGS jobs by the goods and services industry. Using the BLS 2011 data for the State of Maryland, the demand varies significantly across the industry sectors with the largest being the construction industry and the lowest being administrative and waste services. Also, the economic outlook for each of the sectors could have an impact on the economic impact estimates. For example, the construction industry is highly cyclical and demand for green jobs would depend in part on the outlook for that industry.

**3. The Bill’s positive or negative effect, if any on employment, spending, savings, investment, incomes, and property values in the County.**

Based on the projections by BLS and the report by the USEER as reported by the Environmental and Energy Study Institute, the outlook for green jobs is positive. However, that outlook depends on the overall economic outlook for specific industries that would demand such jobs to build and maintain systems that create energy from renewable sources and enhance an industry’s production processes to reduce costs by using fewer natural resources. For those industries with a larger percentage of GGS jobs to total jobs than those with a smaller percentage, the positive effect on employment depends on the economic growth of those industries with the larger percentage.

**4. If a Bill is likely to have no economic impact, why is that the case?**

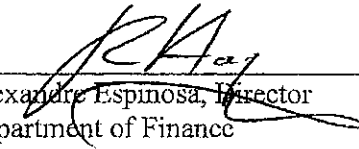
Bill 15-18 is likely to have a positive economic impact on employment in the County based on the demand for such “green” jobs and on the economic outlook noted in paragraphs #2 and #3.



Economic Impact Statement  
Bill 15-18, Economic Development – Workforce Development – Green Job  
Apprenticeship Program

5. The following contributed to or concurred with this analysis: David Platt and  
Rob Hagedoorn, Finance.

For

  
\_\_\_\_\_  
Alexandre Espinosa, Director  
Department of Finance

5/7/18  
Date



14501 Sweitzer Lane • Laurel, Maryland 20707-5901

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Carla A. Reid

May 15, 2018

The Honorable Hans Riemer  
Council President  
Montgomery County Council  
100 Maryland Ave, 5<sup>th</sup> FL  
Rockville, MD 20850

RE: Bill 15-18 Workforce Development – Green Jobs Apprenticeship Program

Council President Riemer:

Clean energy jobs, including middle-skilled jobs, are essential to the larger discussion surrounding the growth of jobs in Montgomery County. The Washington Suburban Sanitary Commission (WSSC) supports this legislation's efforts to create a workforce that supports a clean energy economy.

In recent years, WSSC has been working proactively to improve succession planning in order to address the challenges of an aging workforce. As part of our program, WSSC hopes to include pre-apprenticeship and apprenticeship opportunities. A pre-apprenticeship pipeline could provide qualified, high-skilled workers for our fleet, carpentry and welding divisions. WSSC is currently expanding and redesigning a green jobs program that will fill vacancies in our electrical and mechanical divisions. This legislation would create a pipeline of middle-skilled workers for WSSC and by extension our contractors. Pre-apprenticeships and apprenticeships afford employers an opportunity to evaluate employees in a real-world environment and ensure they are prepared become a contributing member of the workforce.

We look forward to speaking with Worksource Director Giles to build a partnership that is beneficial to both WSSC and Montgomery County.

Crystal Ruiz, Government Relations Manager



## Montgomery County Group

May 15, 2018

Testimony of Montgomery County Sierra Club on Montgomery County Bill No. 15-18

Good afternoon. My name is Michal Freedman and I am here speaking in support of Bill 15-18 on behalf MoCo Sierra Club and its 6000 members.

Sierra Club is committed to creating a sustainable planet and combatting climate disruption by transitioning to clean renewable energy. That transition can and should be accompanied by an economic plan that creates good-paying, skilled green jobs. It is a false and dangerous narrative to posit that there is a conflict between preserving the environment and preserving middle class jobs. But both do require intentional and government intervention. Montgomery County can be a leader in preserving a sustainable planet and a sustainable economy. Bill 15-18 is a step in the right direction.

Transitioning to a clean renewable energy system will create opportunities for new job creation. Many of these jobs will require skills different from those in the current fossil-fuel based energy sector. To ensure that we have sufficient numbers of skilled workers right here in Montgomery County to fill these jobs, we must create high quality training programs that are affordable and equitable. Creating an apprenticeship program is exactly the right way to go about this.

These kinds of apprenticeship programs have already been established in other parts of the country and have proven to be effective both in training workers and in building community support for a greener energy system.

We urge passage of this bill and encourage further efforts to link environmental preservation and economic growth.

Thank you.

Montgomery County Council Public Hearing on Bill 15-18

Testimony in Support of the Green Jobs Apprenticeship Program

May 15, 2018

Testimony of George Escobar  
On behalf of CASA

Distinguished Members of the County Council:

My name is George Escobar and I am Senior Director of Services at CASA. I thank you for the opportunity to speak today in support of Bill 15-18 in establishing a clean energy industry pre-apprenticeship job training program.

CASA has a long history of providing vital vocational training instruction for the county's immigrant community. Last year alone, in partnership with such entities as Montgomery College, CASA provided vocational training to 584 CASA members, 93% of whom earned an industry recognized certification in many construction fields including HVAC, Electricity, Building Maintenance, Rebar installation, among many others.

Among the most popular of the courses that CASA has offered recently have been those related to the Green Economy. CASA currently offers a Solar Panel Installation Course as well as a Landscaping Course using native vegetation and sustainable techniques, which have been incredibly popular. Our Solar Panel Installation course for instance had a waiting list twice as large as the capacity of the course. Thanks to your partnership and plans we have to expand the capacity of our Rockville Site, we will have the ability to offer this 3 module course more often.

As these examples demonstrate, our community is eager to participate in these new opportunities in the green economy. As such, we believe the clean energy pre-apprenticeship initiative is a timely and welcome program that will facilitate greater access to this industry for many of our residents. However, in order to ensure every effort is made to provide equal access to these opportunities for all members of our community, we recommend you encourage Worksource Montgomery to establish strong collaborations with entities providing existing vocational training such as CASA, in an effort to have our work complement one another to further our collective goals. Through this collaboration we are happy to provide input on how best to facilitate the participation of working class immigrant communities, and share our experience in this regard – through designing culturally proficient curricula as well as conducting targeted recruiting efforts.

CASA stands ready to assist you in your efforts to launch this initiative, looks forward to your partnership and hopes it is but the start of similar efforts in the future.