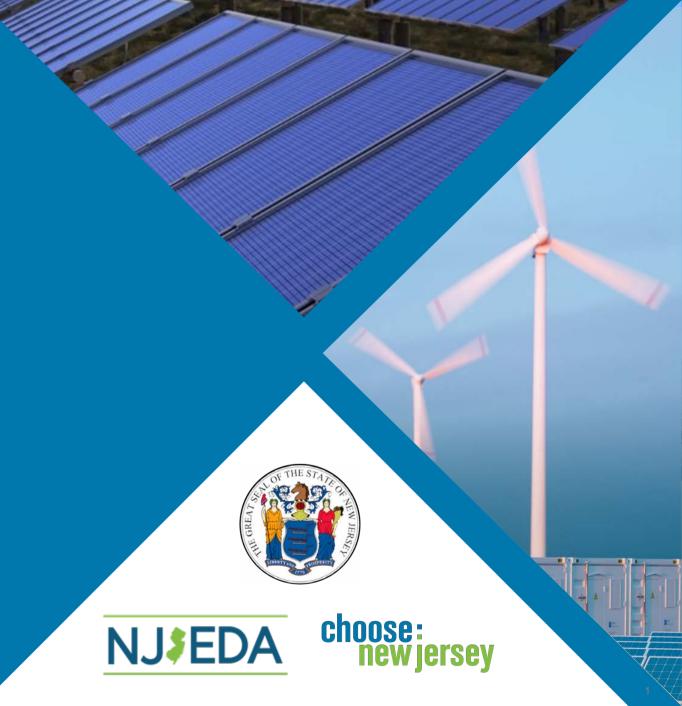
NEW JERSEY
CLEAN ENERGY
ECONOMY





## Why choose New Jersey for CLEAN ENERGY?



## Unmatched location and infrastructure assets

- Be at the center of the densely-populated, energy-dependent Northeast Corridor
- Enjoy unmatched regional and global connectivity with next-door access to NYC and Philadelphia and ~600 nonstop flight destinations<sup>1</sup>
- Take advantage of the largest port on the East Coast and our best-in-class digital infrastructure



#### Committed to a worldclass clean energy economy

- Be a part of our bold political and financial commitment to 100% clean energy and a thriving clean energy economy
- Locate in a State with leading clean energy use and a robust pipeline of clean energy demand
- of clean energy companies that call NJ home and are leveraging world-class supports in order to grow



# Diverse talent to fuel the clean energy economy

- Access the high-skilled and blue-collar workers needed across your entire business, tapping into a 114,000+ clean energy talent pool
- Hire from a truly diverse talent pool and the highest concentration of scientists and engineers in the US
- Tap into a robust talent pipeline, supported by 150+ higher education institutions supporting leading energy R&D



## A place for every employee

- Offer employees access to the #1 ranked pre-K-12 education system in the nation
- Provide employees with a choice of commutable city, small town, country, and coastal living
- All this at a fraction of the cost of New York and Philadelphia and just a short train ride away

**UNMATCHED LOCATION AND INFRASTRUCTURE ASSETS** 



**HEART OF THE NORTHEAST CORRIDOR** 



**NEXT TO NYC AND PHILADELPHIA WITH EASY ACCESS TO** THE GLOBE



THE #1 PORT ON THE **EAST COAST IN THE #1 DIGITALLY-CONNECTED STATE** 





### At the heart of the Northeast corridor, next to NYC and Philadelphia



Train times from Newark Penn Station

~4 hours

Day trips by train to Washington DC and Boston

\$2.9 trillion

GDP within 150 miles<sup>1</sup>

36 million

consumers<sup>1</sup> within 150 miles

NOTE: All train times referenced from Newark Penn Station

1 Includes the GDP and population of counties whose centers are within 150 miles of New Jersey



Easy access to employees, clients, and customers across the globe





## Importing and exporting goods could not be easier for your business



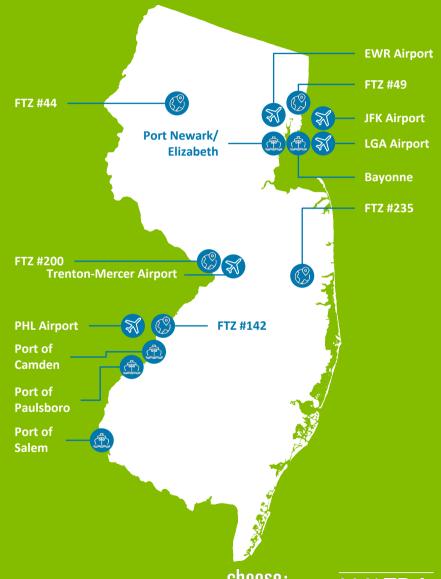
Access 6
Airports,
3 International



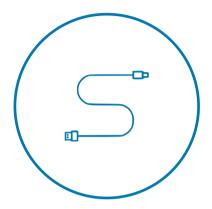
#1 largest port on the East Coast



5 strategically located Foreign Trade Zones throughout the State



## **Best-in-class Digital Infrastructure**

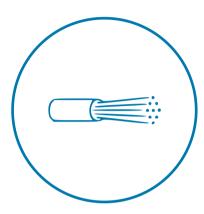


**Best Broadband access** in the country (broad coverage, high-speeds, and low pricing)



#2

access to a wired connect with speeds over 100 Mbps+ (97.7%)



**67%** 

population with access to fiber-optic internet (National Avg is 25%)







A DEEP POLITICAL AND FINANCIAL **COMMITMENT TO THE CLEAN ENERGY ECONOMY** 



**UNMATCHED ACCESS TO A PIPELINE OF CURRENT AND FUTURE CLEAN ENERGY CONSUMERS** 



**HOME TO ESTABLISHED AND GROWING CLEAN ENERGY COMPANIES AND A** PERFECT ECOSYSTEM FOR INNOVATION

## NJ's commitment to clean energy

66

To get New Jersey right, we must both grow our economy and make it fair. Investing in clean energy does both.

- **Phil Murphy**Governor of NJ

NJ has made bold commitments to lead in clean energy (EMP)...

100%

Clean energy use by 2050

**7.5GW** 

Install offshore wind by 2035

2% & 0.75%

Reduce electric and gas consumption

**2 GW** 

Install energy storage by 2030

...and is making the financial investments needed to follow through



in direct public expenditures via NJ Clean Energy Program since 2001

\$20+ billion

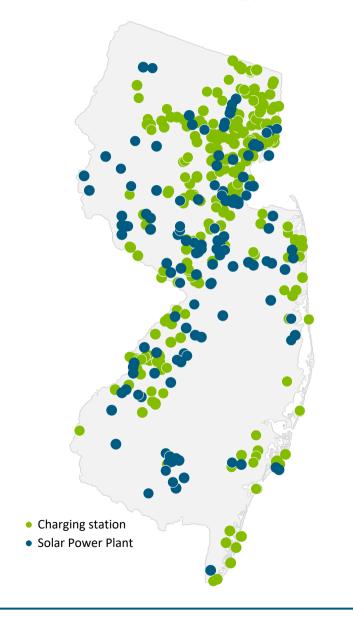
in public and private solar investment in the State

\$95+ million

of additional annual funding through RGGI to support more innovative clean energy programs



## We are a clean energy State with the investments in place to show for it





650<sup>+</sup> Electric Vehicle charging stations

**1710**<sup>+</sup> Electric Vehicle charging outlets

500<sup>+</sup> Medium Duty ZE Vehicles to roll out



**Q** Operational energy storage projects

of existing large-scale battery storage 40% power capacity lies in the PJM regional transmission organization

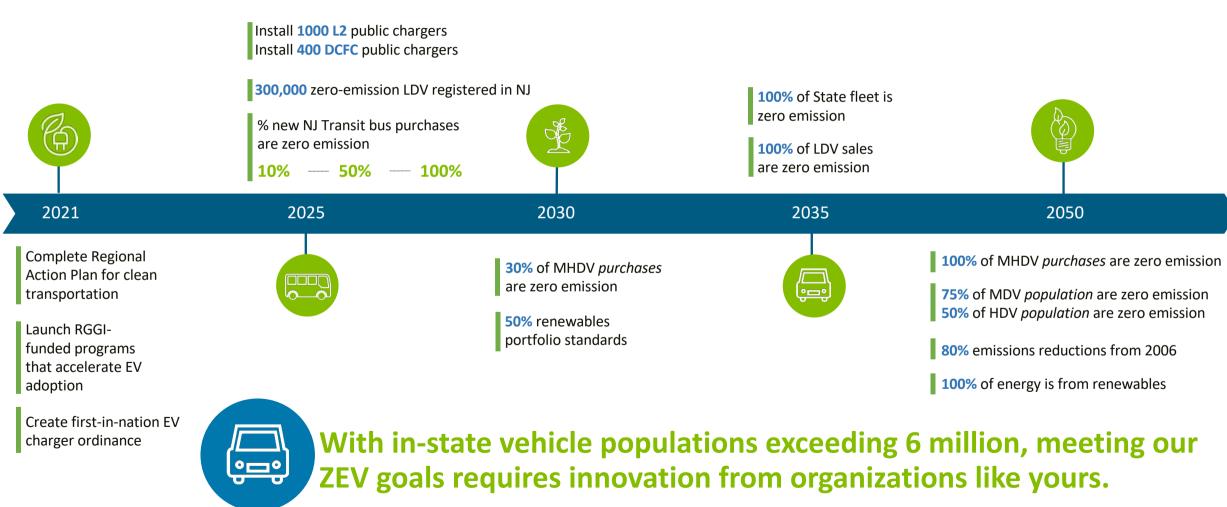


3.8 GW Installed Solar PV capacity to-date and growing



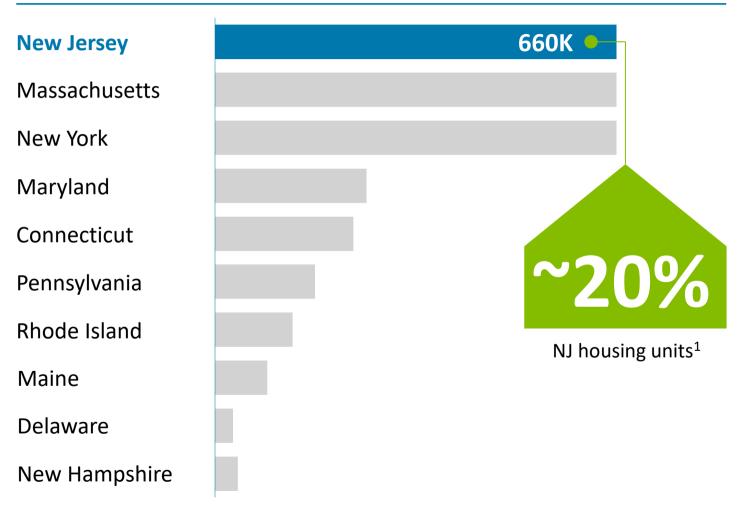
## Setting the Stage: ZEVs in NJ | A burgeoning market bolstered by aggressive adoption targets

New Jersey has already shown measurable progress towards its aggressive targets for clean, equitable transportation - shown below - with a focus on localizing ZEV research, development, and supply chain.



## We have a well-established customer base and the #1 solar capacity in the Northeast

#### Number of homes that could be powered by installed solar capacity in the Northeast





in Northeast for installed solar capacity (700 MW more than NY)



in Northeast for number of solar panels installed (100,000+)



Percentage of State's **Electricity from Solar** 

1 Includes all occupied housing units minus mobile homes

### NJ has a strong pipeline of corporate clean energy demand



state for companies to procure renewable energy



Feb 2021 – 57.5-kW custom rooftop solar system installed at its distribution center in Pompton Plains, NJ



Oct 2020 - Completed a 461kilowatt rooftop solar installation at HQ in Wayne, NJ.



Nov 2021 – Install 926 kWDC Solar Panels at Two Manufacturing Sites, Supporting the Sustainability of New Jersey's **Electrical Grid** 



Jun 2021 – Both selected in latest 2.7GW offshore wind solicitation from the NJBPU.



Jun 2021 - Accelerates its Net-Zero Climate Vision to 2030, **Including Significant Reductions** in Methane, Carbon Emissions



Oct 2021 - \$4 million solar energy project at manufacturing facility, providing 2.2 million kilowatt-hours of clean energy per year.

### Cognizant

Oct 2021 – Cognizant Commits to Net Zero Emissions by 2030, **Prioritizing Clean Energy** Sourcing and Energy Efficiency





Nov 2021 –Will build and operate 35 MW of rooftop community solar projects in New Jersey.



Aug 2021 - installation of new charging stations at the Westfield Public Parking Lot



Feb 2021 - To deploy 30 new DC fast charging stalls at eight locations across the Garden State.



Apr 2021 – Announces plan to achieving 100% carbon-neutral operations by 2040



## Our bold vision has led to a growing clean energy economy in the State





































700+

Clean energy companies<sup>1</sup> in NJ





















### With many clean energy companies doubling down in NJ

Attracts A-list venture investors committed to addressing climate change, closes \$78 Million fundraise

Low-carbon cement leader



Plans to Transform Former Coal-Fired Power Plant into Clean Energy Hub, Connecting Offshore Wind to New Jersey's Electric Grid

**Energy Asset Manager** 



BP invests \$7 million. leading a \$13.2 million investment round

**EV Charging Firm** 



Raises \$10M for National **Expansion of Virtual Power Plant** Software That Reduces Carbon **Emissions** 

**Smart Building Software** 



2021



Global electric vehicle company

Opened 30,000 sq. ft. service center to handle customer aftersales care



78-Year Lease

NJEDA and PSEG sign 78-year lease for the New Jersey Wind Port



RENEWABLE ENERGY PROVIDER

Solar energy company

Signed a long-term lease for a larger space in Jersey City

SOURCE: Company press releases

2022

## We have the supports to help clean energy companies

#### **ORCHESTRATED POLICIES**

Draft 2050 Energy Masterplan







### **INNOVATIVE FINANCING**

Green Fund \$100M+ investment Regional Greenhouse Gas Initiative \$200M+ to reduce GHG Infrastructure Bank Green bonds to finance infrastructure projects







# SUPPORTIVE INSTITUTIONS AND PROGRAMS









National labs

# PUBLIC AND PRIVATE COLLABORATIONS



Partnership to Plug-In



NJ Council on Green Economy



\$17B investment through 2025 in NJ clean energy infrastructure LARGE AND ACCESSIBLE **TALENT POOL** 



50,000+

clean energy workforce with job growth over 10% in 2020

# **DIVERSE TALENT** TO FUEL THE **CLEAN ENERGY ECONOMY**

**GLOBALLY AND RACIALLY DIVERSE POPULATION** 



4th

most racially and ethnically diverse state in US

PIPELINE OF TOP TALENT



150+

higher education institutions in the region

### Bridging the skills gap







# NJ's PATHWAYS AND SKILLS COLLABORATIVE

Promotes the earning of stackable, industry-valued credentials by designing and offering robust and inclusive pathways guided by industry-specific employer leadership groups and informed by labor market intelligence.

This initiative focuses on the development in the following industries:

**Health Services** 

**Innovation and Technology** 

Global Manufacturing and

Energy

**Supply Chain Management** 

Partners include Intel, HP, and Norwalt.

# ADVANCED MATERIALS AND MANUFACTURING INSTITUTE

The Advanced Materials and Manufacturing Institute (AMMI)'s mission is to advance fundamental and applied science and engineering technology related to materials and manufacturing with the vision to responsibly utilize nature's chemistries, both renewable and fossil reserves, to enhance material performance and improve our global sustainability.

# ECOCOMPLEX, RUTGERS UNIVERSITY

The EcoComplex "Clean Energy Innovation Center" is the state's clean technology and environmental research, outreach and business incubation center. It serves as a university-based hub of information and resources for industry, academia and government and is designed to facilitate the commercialization of new technologies and business concepts.





### A large, accessible, and talented workforce

## Large and accessible talent pool...

~4.4M

Total workforce

#1

state by population density

~1,200

residents per square mile

...across a range of talent needs

41%

with bachelor's degree+

~2.6M

high-skilled population<sup>1</sup>

middle-skilled population<sup>2</sup>

We intend to combine our unique blend of German engineering expertise with our local team's know-how in energy policy and community engagements to advance [New Jersey's] goals for clean energy.

> - Holger Grubel **Head of Offshore** Wind Portfolio **Development EnBW**

1 Bachelor's degree or higher

2 High school diploma + Associates Degree





A workforce ready for the future



3rd

In density of STEM Graduates, 2019-20



100,000+

Degrees and certificates awarded at postsecondary institutions, 2019-20



2<sup>nd</sup>

In scientists and engineers per square mile

STEM includes Computer and Information Sciences and Support Services, Engineering Technologies and Engineering-Related Fields, Biological and Biomedical Sciences, Mathematics and Statistics, Physical Science Technologies/Technicians

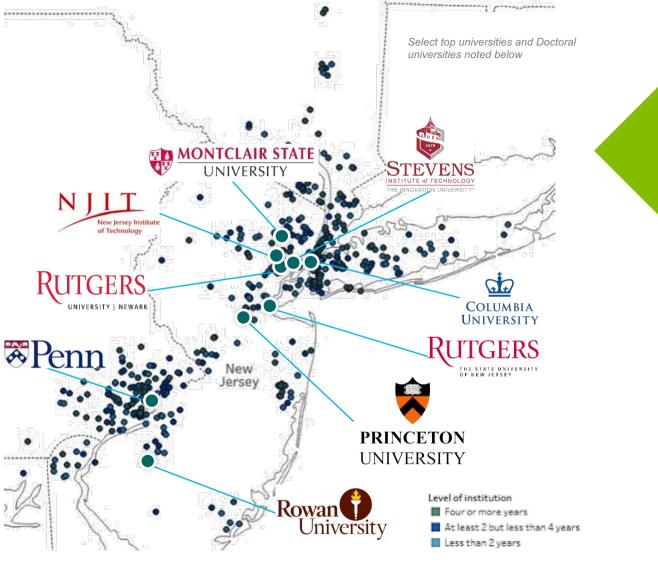




## Diverse talent needed to compete in a globally diverse world



## Access to 150+ premier higher education institutions



1 New Jersey region includes New Jersey state, New York-Newark-Jersey City, NY-NJ-PA MSA and Philadelphia-Camden-Wilmington, PA-NJ-DE-MD MSA 2 Includes universities under Carnegie classification: Doctoral Universities: Very High Research Activity, Doctoral Universities: High Research Activity

3 Includes Princeton, Columbia University and University of Pennsylvania

150+ institutions in

the region<sup>1</sup>

\$7.8 billion

R&D expenditures<sup>1</sup>

25

**Doctoral** universities<sup>1,2</sup>

#1

University in the country and

3 of top 10<sup>1,3</sup>





**Asbury Park** 





COASTAL **ENCLAVES** 

choose: NJ\$EDA

## Montclair

A safe and vibrant suburb with incredible schools, world-class dining options, and direct access to New York City





## The #1 Pre-K-12 education system in the country







ranked in Pre-K-12 education





PA

NY

35

40

CA

TX

of the top 30 school districts



of the top 20 high schools in the US



## A short train ride from New York City but significantly more affordable

If your income in Manhattan is...

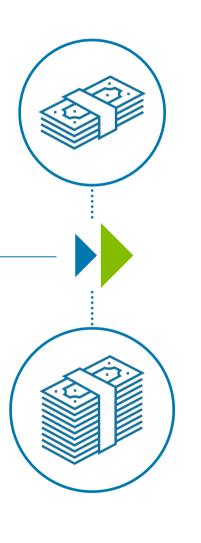
~\$100,000

after taxes

Moving to Newark would get you...

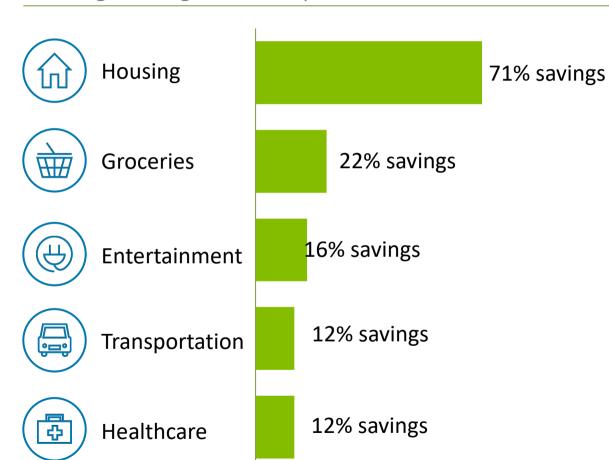
~\$200,000

of purchasing power



#### **Typical savings moving from Manhattan to Newark**

% savings vs. original dollar spend







## Access to New York City and all its amenities at a fraction of the cost





## Endless opportunities for leisure



130

Miles of Coastline



130

Craft Breweries



9,900

**Farms** 



256

**Historical Sites &** Memorials



400+

Lakes, Pond & Reservoirs



335

**Golf Courses** 



949

Miles of Hiking



44

Zoos, Arboretums & Gardens



State Parks



18

Theme Parks



150

Museums



Ski Mountains



10

**Sports Stadiums** 



## A progressive agenda that helps attract diverse, highly-skilled talent

#### **Governor Phil Murphy Celebrates Groundbreaking** of Historic Research, Education and Innovation **Hub in New Brunswick**

NEW BRUNSWICK - Governor Phil Murphy, Rutgers President Jonathan Holloway, Princeton Provost Deborah Prentice, Hackensack Meridian Hospital CEO Bob Garrett, RWJ Barnabas CEO Barry Ostrowsky, and Assembly Speaker Craig Coughlin, along with other academic, elected, and private sector leaders today broke ground on the historic New Jersey Innovation and Technology Hub, a 550,000 square foot development that will be a center of innovation, research, and medical education in downtown New Brunswick.

#### **Governor Murphy Advances Climate Action to** Secure New Jersey's Clean Energy Future

Governor Establishes New Interim Greenhouse Gas Reduction Goal and Announces \$33 Million Investment in Clean Transportation Projects

## Murphy announces \$400M in Capital Facilities Funding to support higher education

By Linda Lindner (New Brunswick) - November 16, 2021

U.S. DEPARTMENT OF COMMERCE INVESTS \$3 MILLION TO SUPPORT GROWTH OF AVIATION TECHNOLOGY CLUSTER IN CAPE MAY COUNTY, NEW JERSEY

December 9, 2021

Murphy Administration Charges Toward an Electric Vehicle Future, Including New Effort to Encourage EV Charging Infrastructure in Every New Jersey Municipality

September 8, 2021, 6:14 pm | in

Posted on: October 1, 2021

Gov. Murphy Establishes Office of Diversity, Equity, Inclusion, and Belonging

On Tuesday, September 28, Governor Phil Murphy signed Executive Order No. 265 (EO 265), which establishes the Office of Diversity, Equity, Inclusion, and Belonging to be led by newly appointed Jayne Johnson.

## We'd love to connect with you!





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