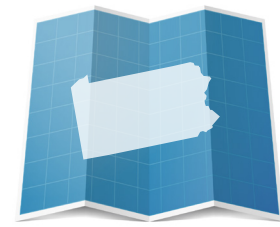


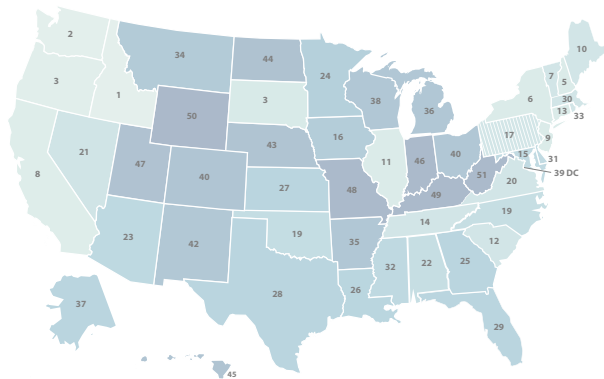
# HOW DOES PENNSYLVANIA STACK UP ON CLEAN ENERGY?



DATA AS OF 2020



## LOWEST CO<sub>2</sub> EMISSIONS RATE



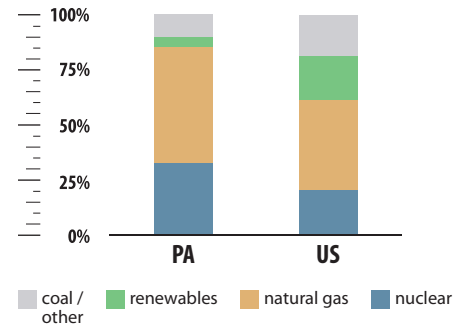
# #18

0.31 tCO<sub>2</sub>/MWh

CO<sub>2</sub> EMISSIONS RATE  
0.1 tCO<sub>2</sub>/MWh 0.9 tCO<sub>2</sub>/MWh



## ELECTRICITY SOURCES



## CLEAN ENERGY JOBS

# #8

102,095  
(2020)



COVID-19 job losses totaled at least 16,735  
March-December 2020 (cumulative).



## CLEAN ENERGY RANKINGS

# #19

ENERGY EFFICIENCY  
SCORE = 22



# #13

52% GENERATION FROM  
NATURAL GAS



# #47

4% GENERATION FROM  
RENEWABLES



## RENEWABLE ELECTRICITY CAPACITY

# #34

88 MW  
(2020)

### NEW BUILD



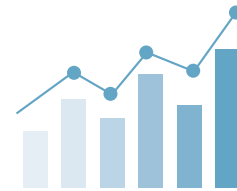
# #25

3,647 MW

### CUMULATIVE



# ENERGY INNOVATION IN A 21<sup>ST</sup> CENTURY ECONOMY



## WHAT ENERGY INNOVATION MEANS FOR PENNSYLVANIA



**\$32.3 MILLION** Office of Energy Efficiency and Renewable Energy Grants in FY20

**\$40 MILLION** Office of Science grants in FY20

**\$1.15 BILLION** State and Indian energy programs, environmental cleanup, and other routine activities in FY20

**\$70.5 MILLION** Advanced Research Projects Agency-Energy grants since FY2009

**33 GRANTS** By ARPA-E since 2009

## IMPACTS OF FEDERAL R&D IN ENERGY SECTOR (TOTAL, 2018)

**#17** 980 JOBS SUPPORTED

**#16** \$113 MILLION CONTRIBUTED TO GDP

## BUSINESS SPOTLIGHT

**BUILDSIMHUB (PITTSBURGH, PA) | [BuildSim.io](https://BuildSim.io)**



**BuildSim**

BuildSimHub Inc provides cloud resources to simplify complex energy calculations and help architects and engineers design more energy-efficient buildings. Founded in 2017, this early-stage company has potential to help reduce emissions from buildings, the largest energy-consuming sector in the U.S. Support from Department of Energy's Small Business Innovation Research (SBIR) program helped the company improve and launch its software to market.