



**AMERICAN  
BIOGAS  
COUNCIL**

# Biogas State Profile: Nevada

## Biogas Potential

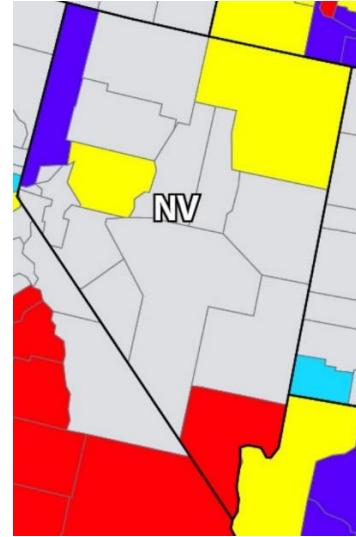
Nevada ranks #36 among U.S. states for methane production potential from biogas sources.<sup>1</sup>

Currently Nevada has 7 operational biogas systems. We see the potential for more than 31 new projects to be developed based on the estimated amount of available organic material.

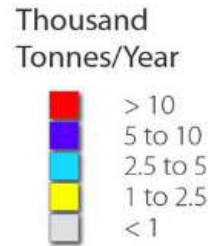
Constructing this many projects would generate \$93 million in capital investment, and create 775 short-term construction jobs, 62 long-term jobs, and numerous industry-supporting jobs.

If fully realized, these biogas systems could produce enough electricity to power 6,110 homes (145 million kWh) or enough renewable natural gas to fuel 725,045 vehicles.

They would also collectively reduce greenhouse gas emissions by the equivalent of 4.3 trillion tons of carbon dioxide, the same as growing 2.6 million tree seedlings for ten years or the amount 87,104 acres of U.S. American forest sequester each year.<sup>2</sup>



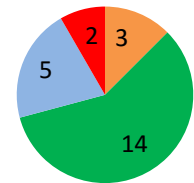
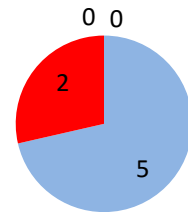
This analysis illustrates the methane generation potential by county from the following biogas sources: landfills; animal manure; wastewater treatment; and industrial, institutional, and commercial organic waste (IIC).



## U.S. Energy Rankings

| Energy   |  |
|--|--|
| Total CO2 Emissions <sup>12</sup>              | Ranks 39 <sup>th</sup> in U.S., 0.8% share |
| Per Capita Energy Consumption <sup>13</sup>    | Ranks 41 <sup>st</sup> in U.S.             |
| Renewable Electricity Generation <sup>14</sup> | Ranks 23 <sup>rd</sup> in U.S.             |
| Energy Prices Rank <sup>15</sup>               | Ranks 19 <sup>th</sup> in U.S.             |

## Operational Systems Potential Systems



Food Waste Agriculture Waste Water Landfill

## Biogas Systems

### Food Waste

|  |   |
|--|---|
| Operational food waste biogas systems <sup>3</sup> | 0 |
| Potential food waste biogas systems <sup>4</sup>   | 3 |

### Agriculture

|  |    |
|--|----|
| Operational biogas systems on farms <sup>5</sup> | 0  |
| Potential dairy farm biogas systems <sup>6</sup> | 13 |
| Potential swine farm biogas systems <sup>7</sup> | 1  |

### Waste Water

|   |    |
|---|----|
| Operational biogas systems at water resource recovery facilities <sup>8</sup> | 5  |
| Potential biogas systems at WRRFS <sup>9</sup>                                | 11 |

### Landfills

|  |   |
|--|---|
| Operational landfill gas systems <sup>10</sup> | 2 |
| Potential landfill gas systems <sup>11</sup>   | 3 |

## Feedstocks

### Manure

|                                    |                              |
|------------------------------------|------------------------------|
| Total Manure Volume <sup>16</sup>  | 2.9 million gallons per day  |
| Total Dairy Manure <sup>17</sup>   | 251 thousand gallons per day |
| Total Swine Manure <sup>18</sup>   | 3 thousand gallons per day   |
| Total Beef Manure <sup>19</sup>    | 2.5 million gallons per day  |
| Total Broiler Manure <sup>20</sup> | -                            |
| Total Turkey manure <sup>21</sup>  | -                            |

### Food Waste

|  |                            |
|--|----------------------------|
| Total Food Waste Generated <sup>22</sup> | 156 thousand tons per year |
|--|----------------------------|

### Waste Water

|  |                              |
|--|------------------------------|
| Average flow from WRRF's <sup>23</sup> | 15.7 million gallons per day |
|--|------------------------------|

\* All citations are available on [AmericanBiogasCouncil.org](http://AmericanBiogasCouncil.org).

- 
- 1 <http://www.nrel.gov/docs/fy14osti/60178.pdf>
  - 2 (See ABC Biogas Potential Calculator)
  - 3 (See ABC Food Waste Digester Excel Spreadsheet)
  - 4 (See ABC Biogas Potential Calculator)
  - 5 <http://epa.gov/agstar/projects/index.html>
  - 6 [http://www.agcensus.usda.gov/Publications/2012/Full\\_Report/Volume\\_1,\\_Chapter\\_1\\_State\\_Level/Nevada/st32\\_1\\_0\\_17\\_019.pdf](http://www.agcensus.usda.gov/Publications/2012/Full_Report/Volume_1,_Chapter_1_State_Level/Nevada/st32_1_0_17_019.pdf) (Farms with 500 to 999 milk cows)
  - 7 [http://www.agcensus.usda.gov/Publications/2012/Full\\_Report/Volume\\_1,\\_Chapter\\_1\\_State\\_Level/Nevada/st32\\_1\\_0\\_32\\_033.pdf](http://www.agcensus.usda.gov/Publications/2012/Full_Report/Volume_1,_Chapter_1_State_Level/Nevada/st32_1_0_32_033.pdf) (Farms with 5,000 or more hogs)
  - 8 <http://resourcerecoverydata.org/>
  - 9 (See Above)
  - 10 <http://www.epa.gov/lmop/projects-candidates/operational.html>
  - 11 <http://www.epa.gov/lmop/projects-candidates/candidates.html>
  - 12 <http://www.eia.gov/state/rankings/?sid=CA#series/226>
  - 13 <http://www.eia.gov/state/?sid=CA#tabs-5>
  - 14 (See Above)
  - 15 <http://www.eia.gov/state/rankings/#/series/31>
  - 16 (See EQIP State Matrix Livestock Inventory)
  - 17 (See Above)
  - 18 (See Above)
  - 19 (See Above)
  - 20 (See Above)
  - 21 (See Above)
  - 22 <http://www.calrecycle.ca.gov/Publications/Documents/General/2009023.pdf>
  - 23 <http://resourcerecoverydata.org/>

**American Biogas Council**  
**1211 Connecticut Ave, NW**  
**Suite 650**  
**Washington, DC 20036-2701**  
**(202) 640-6595**  
[info@americanbiogascouncil.org](mailto:info@americanbiogascouncil.org)