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## UNIV | THE LINCY INSTITUTE & BROOKINGS MOUNTAIN WEST

#### RESEARCH SPACE AT PUBLIC R1 UNIVERSITIES IN THE MOUNTAIN WEST, 2021

Higher Education Fact Sheet No. 32 | January 2024

Prepared by: Zachary Billot, Jesse Fager, Caitlin J. Saladino, and William E. Brown, Jr.

#### **PURPOSE:**

This fact sheet reports data on research space square footage for public R1 universities in five Mountain West States: Arizona, Colorado, Nevada, New Mexico, and Utah. This fact sheet includes national rankings of public R1 universities in the Mountain West states based on total square footage and reports square footage for individual research disciplines for the two public R1 universities in Nevada: the University of Nevada, Las Vegas (UNLV) and the University of Nevada, Reno (UNR).

#### **ABOUT THE DATA:**

The data for this fact sheet are sourced from the 2021 report, "Survey of Science and Engineering Research Facilities" from the National Center for Science and Engineering Statistics reported by the National Science Foundation.<sup>1</sup> Data are available for all surveyed universities and colleges in the United States, but this fact sheet reports data only for public universities in the Mountain West classified as R1: Doctoral Universities – Very High Research by the Carnegie Classification of Institutions of Higher Education.<sup>2</sup> The R1 designation is awarded based upon institutions' doctoral production and research expenditures.<sup>3</sup> The total square footage of research space is presented for each public R1 university in the Mountain West. Research space for UNLV and UNR are disaggregated in the following 12 categories: agricultural sciences; biological and biomedical sciences; computer and informational sciences; engineering; geosciences, atmospheric sciences, and ocean sciences; health sciences; math and statistics; natural resources and conservation; physical sciences; psychology; social sciences; and other. Research space at medical schools is excluded.

#### **KEY FINDINGS:**

- 1. As of 2021, UNR, with 558,000 square feet of total research space, reported more than twice the research square footage as UNLV (263,000 square feet).
- 2. UNR (111,000 square feet) operates 2.4 times more engineering research space than UNLV (46,000 square feet) and 3.3 times more biological and biomedical research space, 143,000 square feet for UNR and 43,000 square feet for UNLV.
- 3. UNLV holds the lowest national ranking (197<sup>th</sup>) for research space among all Mountain West public R1 universities, with 263,000 square feet of research space.
- 4. The University of Utah (35<sup>th</sup>) ranked highest nationally for research space in the Mountain West with 1.718 million square feet.
- 5. Nevada (UNLV, 197<sup>th</sup> and UNR, 126<sup>th</sup>) and New Mexico (University of New Mexico, 111<sup>th</sup>) are the only Mountain West states without a public **R1** university ranked in the top 100 nationally.

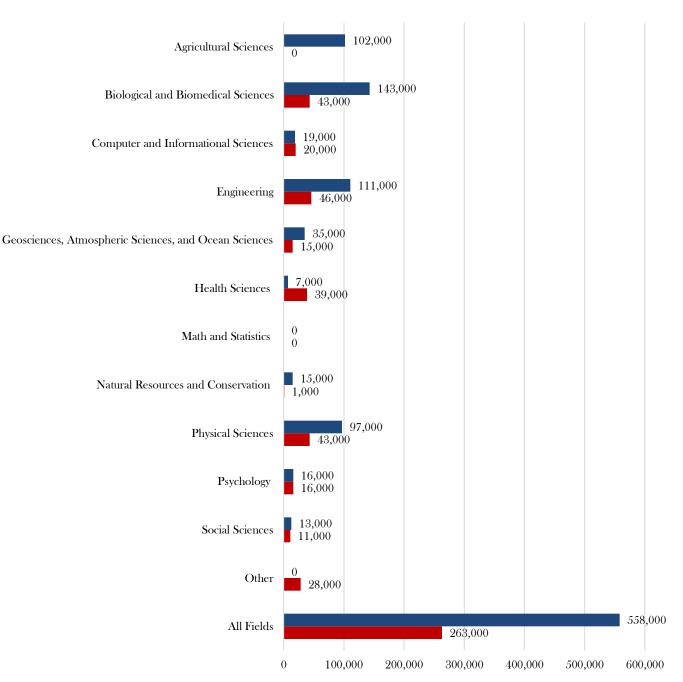
<sup>&</sup>lt;sup>1</sup> "Survey of Science and Engineering Research Facilities," National Center for Science and Engineering Statistics, https://ncses.nsf.gov/surveys/scienceengineering-research-facilities/2021#data

<sup>&</sup>lt;sup>2</sup> "Basic Classification," Carnegie Classification of Institutions of Higher Education, https://carnegieclassifications.acenet.edu/carnegie-classification/classificationmethodology/basic-classification/

<sup>&</sup>lt;sup>3</sup> Ibid.

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Figure 1 presents the total square footage for each research category for Nevada's two public R1 universities. UNLV, shown in red, reports its highest square footage in engineering at 46,000 square feet. UNR possessed more than twice the engineering research space of UNLV's largest category, engineering, with 111,000 square feet. For UNR, shown in blue, biological and biomedical sciences totals the largest category of research space with 143,000 square feet. The biological and biomedical research space for UNR is more than three times that of UNLV (43,000 square feet). UNR, with 558,000 square feet research space, operates more than twice the research space of UNLV (263,000 square feet).

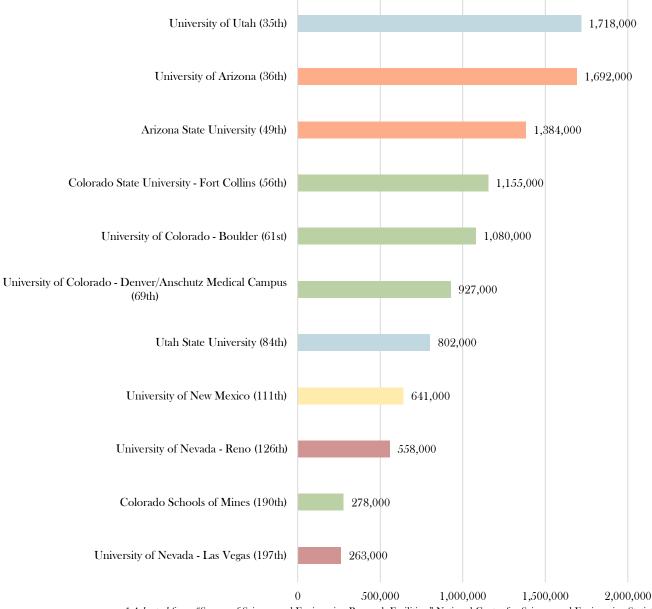




<sup>\*</sup> Adapted from: "Survey of Science and Engineering Research Facilities," National Center for Science and Engineering Statistics, https://ncses.nsf.gov/surveys/science-engineering-research-facilities/2021#data

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Figure 2 presents the total square footage of research space at each public R1 university in the five Mountain West states. At 197<sup>th</sup>, UNLV has the lowest national rank among Mountain West R1 universities, with 263,000 square feet has the least amount of research space among Mountain West public R1 universities. The University of Utah has the largest amount of research space, ranking 35<sup>th</sup> nationally, with 1,718,000 square feet. The University of Arizona ranks 36<sup>th</sup> nationally with 1,692,000 square feet of research space. Both Arizona public R1 universities, Arizona State University (49<sup>th</sup>) and the University of Arizona (36<sup>th</sup>), rank in the top 50 nationally for total research space square footage. Both Nevada universities, UNLV (197th) and UNR (126<sup>th</sup>), as well as the Colorado School of Mines (190<sup>th</sup>), rank below the top 125 nationally. Nevada and New Mexico are the only two Mountain West states without a public R1 university ranked in the top 100 nationally.



#### Figure 2: Total Research Space Square Footage Among Public R1 Universities in the Mountain West, 2021

\* Adapted from: "Survey of Science and Engineering Research Facilities," National Center for Science and Engineering Statistics, https://ncses.nsf.gov/surveys/science-engineering-research-facilities/2021#data