America’s Knowledge Economy: A State-by-State Review

OVERVIEW: Research and development is a critical contributor to innovation and long-term economic growth, and the United States has a long history of being a global leader. According to a new collaborative report from The Council of State Governments and Elsevier—“America’s Knowledge Economy: A State-by-State Review”—the United States published more than 536,000 publications in 2013. Predictably, states with larger populations also tended to publish more. For example, California and New York were the top two producers from 2004 to 2013. From 2004 to 2013, a big chunk of United States publications—more than one-quarter—focused on the field of medicine. Over the same period, Massachusetts and California produced the most impactful research—also called field-weighted citation impact—among all states. This brief offers a state-specific snapshot of data pulled from the report. To read the full report, visit www.csg.org/knowledgeeconomy.

1.41 PUBLICATIONS PER 1,000 RESIDENTS, 2013
U.S. Average: 1.70 publications per 1,000 residents

FIELD-WEIGHTED CITATION IMPACT, 2004–13
1.39 Cited 39% more than global average

COMPARATIVE ADVANTAGE IN RESEARCH

HEALTH PROFESSIONS

Ranked 9th among all states in terms of research impact and cited 23% more than the U.S. average.

NORTH CAROLINA

TOP COLLABORATING STATE, 2004–13
3,804 collaborations from 2004–13 (6.6% of all of South Carolina’s publications).

RELATIVE VOLUME IN MATERIALS SCIENCE, 2004–13
5th among all states
South Carolina produces 29% more publications in materials science than its total research volume would suggest.

RELATIVE VOLUME IN CHEMISTRY AND CHEMICAL ENGINEERING, 2004–13
7th among all states for both fields
South Carolina produces 20% and 21% more publications, respectively, in chemistry and chemical engineering than its total research volume would suggest.
South Carolina universities produced 7.8 publications per million $ USD R&D from 2004 to 2013.

South Carolina’s research in pharmacology is cited 8% more than the U.S. average.

Source: Scopus® and U.S. Census Bureau and NSF Higher Education Research and Development Survey

Impact Across Research Fields, 2004–13

Source: Scopus®

South Carolina

U.S. Average