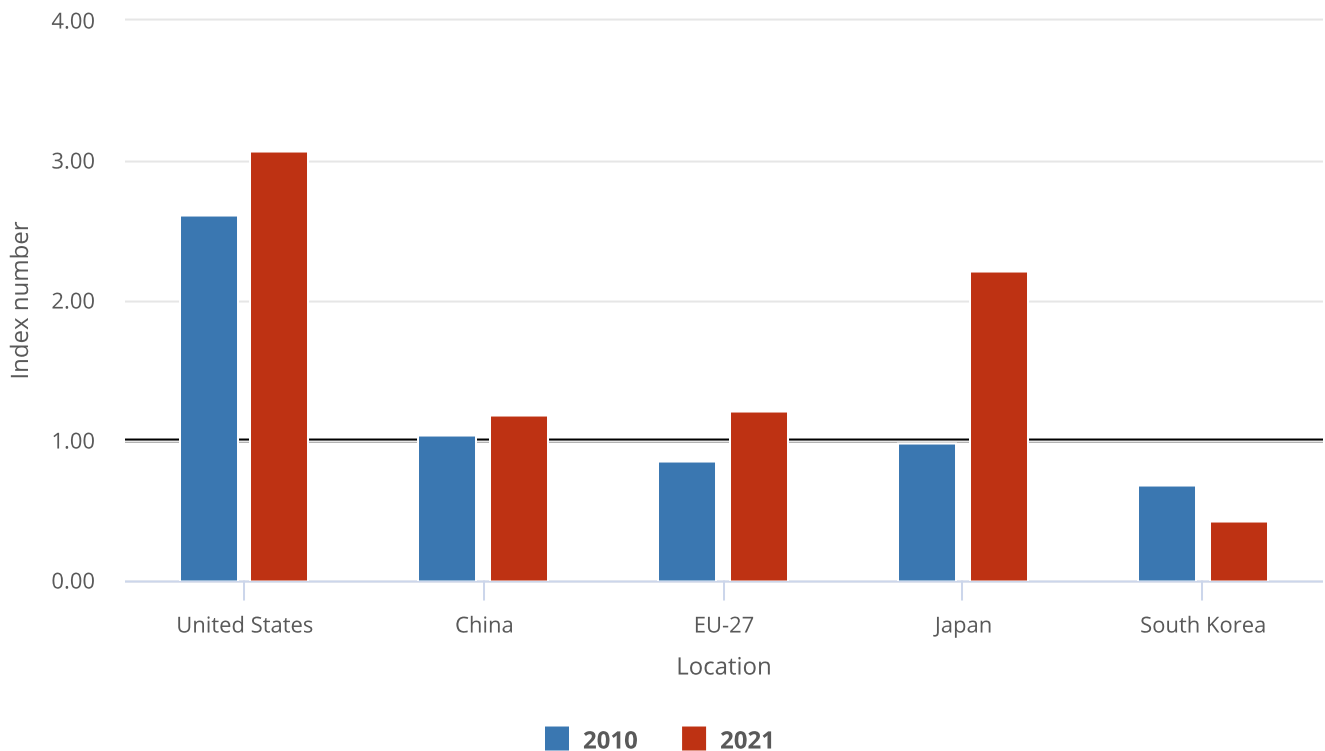


**Figure TRN-13. Highly cited patents granted in biotechnology, medical technology, genomics, and synthetic biology, by selected country or economy: 2010 and 2021**



EU-27 = European Union.

**Note(s):**

Highly cited patents (HCPs) refer to priority patents cited in subsequent priority patent documents. This figure shows the index number for citations within patent documents during all the years available following the reference year, including the reference year itself. For example, for 2010, citations in priority patents between 2010 and 2024, the last year with fully available data, are used in the calculation. The index number has been normalized for patent age, technology area, and patent office through the length of reference list from the citing priority patents. For information on the patent methodology, see <https://www.science-matrix.com/patent-and-trademark-indicators-for-the-science-and-engineering-indicators-2026-technical-documentation/>. This category is based on the 2025 classification of Key Technology Areas developed by the National Science Foundation's Technology Innovation Partnership program and shown in Table STRN-12. The relative HCP of the 20 countries with the most patents in 2024 are shown in Table STRN-20. China includes Hong Kong.

**Source(s):**

National Center for Science and Engineering Statistics; Science-Matrix (Elsevier); Worldwide Patent Statistical Database (PATSTAT), spring 2025, accessed September 2025.

*Science and Engineering Indicators*