



Rankings for Scientist

More Than a Ranking

South Africa's Universities and Research Institutions:

**Comprehensive Analysis of 74 Universities and
Institutions and 19,108 Scientists**

AD Scientific Index 2025



South Africa's Universities and Research Institutions: Comprehensive Analysis of 74 Universities and Institutions and 19,108 Scientists World Scientist and University Rankings 2025

(Total 2.395.161 scientist, 220 country, 24.352 university)

What is the AD Scientific Index (Alper-Doger Scientific Index)? Developed by Prof. Dr. Murat Alper and Associate Prof. Dr. Cihan Döger in 2021, the AD Scientific Index is an independent, international ranking system that evaluates the academic impact of scientists and institutions. The AD Scientific Index analyzes 24.352 institutions and 2.395.161 scientists across 220 countries in 13 major academic fields and 197 disciplines. Based on data obtained from Google Scholar and subjected to multiple levels of data filtering, this study provides a comprehensive assessment of scientists' productivity coefficients, taking into account total and last six years' h-index, i10-index scores, and citation counts. Through its academic rankings, analyses, and comparative results, the AD Scientific Index offers extensive data that facilitates the monitoring, evaluation, and development of policies for enhancing the scientific contributions of both individual academics and institutions.

Why is the AD Scientific Index (Alper-Doger Scientific Index) Needed?

International university rankings typically evaluate institutions based on a variety of parameters. These include research productivity, research impact, research excellence, educational quality, faculty quality, research output, and per capita performance. Rankings also consider factors such as teaching quality, research capabilities, international diversity, and financial sustainability. Among these, publication and citation counts are particularly emphasized, as they are commonly regarded as key indicators of academic performance. The methods used to calculate publication-based indicators vary across rankings. Some measure the number of publications per faculty member, counting not only articles but also notes, and divide the total by the number of academic staff and researchers from the previous year. Data sources also differ, with some rankings relying on SCIE, SSCI, or InCites. While some rankings consider only articles, others include reviews, notes, conference papers, letters, and journal articles indexed in WoS over the past five years. Certain rankings further distinguish themselves by counting the number of articles published in "highly influential journals" like *Nature*, *Science*, and *PNAS*. Citation-based metrics are also important. Indicators like the h-index, the number of publications in top 5% journals by impact factor, and the total number of citations are widely used. These metrics are often calculated using SCIE and SCI data from the past two years, though longer periods, such as 11 years, may also be considered. Other key citation metrics include citations per publication and the number of publications in the top 1% by citation count. Many rankings also normalize citation counts, either by subject or per faculty member. Some introduce new indicators by dividing citation counts by the number of faculty members, aiming for more precise measurements. However, research has shown high correlations between many of these indicators, suggesting redundancy and indicating that some rankings measure the same aspects multiple times. This leads to "indicator alignment," which implies that simplifying rankings by reducing the number of indicators could maintain accuracy while making the ranking process more efficient. Additionally,

the chosen indicators are one of the main limiting factors that prevent these rankings from exceeding 1500-3000 institutions and from covering more than 70-100 countries.

The **AD Scientific Index** stands out because it addresses the limitations of traditional rankings by offering a more comprehensive and detailed approach. Unlike other systems that focus heavily on generalized institutional metrics, the AD Scientific Index is the first and only system to provide a dual analysis of both the total and six-year productivity of scientists. This analysis is based on h-index, i10-index, and citation data, offering a balanced view of both long-term impact and recent academic contributions. This dual focus is essential for accurately assessing a scientist's overall career while also capturing their recent work, which is often overlooked by other rankings. The AD Scientific Index not only ranks scientists individually but also across various academic fields, institutions, and countries, providing a detailed and in-depth analysis of academic performance at multiple levels. Furthermore, the AD Scientific Index offers a broad coverage that spans countries, regions, institutions, disciplines, languages, and types of publications. By ensuring equal opportunities for comparison, it provides a fair and transparent way to track academic progress and identify trends within the global scientific community. This makes it an invaluable resource for students, researchers, and institutions looking to gain insights into the academic landscape. Ultimately, the AD Scientific Index addresses the limitations of traditional rankings by focusing on individual scientific output and offering more precise, up-to-date indicators. This makes it a necessary tool for better understanding and evaluating global academic performance. The AD Scientific Index ranking formulas do not use any parameters that are not publicly accessible or visible for individuals or institutions.

What are the h-index and i10-index? The h-index is a widely recognized metric that evaluates both the productivity and citation impact of a researcher's published work. It is determined by the number of publications (h) that have received at least h citations each. For example, an h-index of 15 signifies that a researcher has authored 15 papers, each cited at least 15 times. A higher h-index reflects a sustained impact in the academic field. The i10-index, calculated by Google Scholar, counts the number of publications with at least 10 citations. This metric, while simpler, offers a valuable perspective on a researcher's consistent academic influence over time.

How is the "AD Scientific Index" "World Scientist and University Rankings" Different from Other Rankings? The AD Scientific Index distinguishes itself by offering a comprehensive analysis that includes both the total and last six years of h-index, i10-index, and citation data. This approach allows for a nuanced understanding of academic productivity and impact. Furthermore, the index ranks institutions by comparing them to all other institutions and then within specific categories, such as private and public universities. This layered ranking system provides a clearer picture of institutional performance in various contexts. Additionally, the index serves as a tool for identifying and addressing academic misconduct, including issues like plagiarism and unethical authorship practices.

The presence of valuable and productive scientists is fundamental to key parameters in traditional academic rankings, such as universities' international reputation, research quality, teaching capacity, and industrial collaborations. These parameters are shaped largely by the academic achievements of these scientists. AD Scientific Index's in-depth focus on these scientists at an individual level reveals the underlying factors driving universities' overall performance in general rankings. Since many elements highlighted in other rankings are directly linked to the number of "valuable and productive scientists," AD Scientific Index underscores the significant influence of individual scientific contributions on a university's overall success. Unlike

other rankings that rely on datasets accessible to only a limited number of institutions, the data on valuable and productive scientists are widely accessible, offering equal opportunities to all institutions and countries. By leveraging this accessibility, AD Scientific Index provides a more inclusive and comprehensive analysis, allowing institutions worldwide to be recognized for their strengths. This democratizes the ranking process and emphasizes the universal importance of individual scientists in shaping the success and reputation of universities, creating a level playing field for all institutions.

Unique Features of the "AD Scientific Index" "World Scientist and University Rankings"

- 1. Academic and Economic Independence:** The AD Scientific Index takes pride in its complete academic and economic independence, ensuring that our evaluations are free from external influences. This independence allows us to provide fair and unbiased assessments of academic performance, offering equal opportunities regardless of country, language, subject matter, or type of scientific publication. Our commitment to impartiality guarantees that scholars and institutions are judged solely on the merit of their academic contributions.
- 2. Transparent and Rigorous Methodology:** At AD Scientific Index, we use open-source and verifiable data to ensure a transparent and rigorous methodology. Our data handling processes, the algorithms we employ, and the weighting of these algorithms are clearly defined, accessible, and open to scrutiny. By openly sharing how each criterion is weighted and calculated, we enable our users to fully understand the ranking process, actively participate in identifying and correcting any errors or ethical issues, and build greater trust in our system. Corrected versions of reported errors are published within one week at the latest. This approach ensures that all evaluations are conducted fairly, in line with the principles of impartiality and equal opportunity.
- 3. Comprehensive Evaluation:** The index uniquely shows the status of universities, institutions, hospitals, and companies, both in total and over the last six years, according to h-index, i10-index, and citation counts. This dual focus is not available in other ranking systems.
- 4. Institutional Progress Analysis:** It tracks and analyzes the progress of institutions over the last six years, providing insights into how universities evolve over time.
- 5. Public vs. Private Comparison:** The index compares public universities with each other, as well as private universities, companies, hospitals, and institutes, both in total and over the last six years, based on h-index, i10-index, and citation metrics.
- 6. Scientific Ranking Distribution:** It analyzes the scientific ranking of academic staff within institutions according to percentiles, offering a detailed breakdown of where institutions stand globally.
- 7. Individual Status Tracking:** The index provides a detailed view of individuals' standings according to their h-index, i10-index, and citation counts, both in total and over the last six years.
- 8. Global and Regional Rankings:** It ranks 2.395.161 individuals by 24.352 institutions, 220 country, 10 regions, and field globally, providing a comprehensive overview of their academic standing. The importance of ranking individuals and institutions according to specific branches and sub-disciplines cannot be overstated. This detailed analysis ensures that both niche specializations and broad fields of study are accurately represented, allowing for a more precise understanding of where individuals and institutions excel.
- 9. Top List Reports:** The index generates top list reports for institutions by country, region, and globally, allowing for easy identification of leading institutions.

10. **Constantly Updated Rankings:** Unlike other ranking systems that may update annually, the AD Scientific Index renews its rankings continuously, ensuring that the data remains current and relevant.
11. **Valuing Feedback and Contributions:** We highly value feedback and contributions from the academic community. By actively seeking and incorporating this input, the AD Scientific Index continuously refines its methodology, ensuring that rankings are accurate and up-to-date. This collaborative approach helps maintain the index's integrity and relevance, fostering a transparent and dynamic ranking system.
12. **Increased Visibility and Early Detection of Ethical Violations:** Excessive publishing, gift authorship, honorary authorship, citation cartels, fake paper factories, and other fraudulent practices pose serious ethical risks in the scientific world. These practices can undermine research quality and reliability, leading to a significant loss of trust in scientific literature. However, one of the key advantages of the database we use is its ability to make these ethical violations—previously thought to go unnoticed—highly visible and detectable at both individual and institutional levels from an early stage.
13. **"Art and Humanities Rankings" and "Social Sciences and Humanities Rankings": Ensuring Fair Comparisons:** Fields such as Art, Humanities, and Social Sciences are often overshadowed by the emphasis on the natural sciences in traditional rankings. To address this imbalance, we have developed separate **Art and Humanities Rankings** and **Social Sciences and Humanities Rankings**. By utilizing Google Scholar, which includes a broader range of academic outputs such as books and theses, we ensure fair and comprehensive representation of these fields. These rankings allow for distinct evaluations that consider the unique contributions of art, humanities, and social sciences, leveling the playing field against the natural sciences. This approach enables institutions to be fairly compared at national, continental, and global levels.
14. **Subject-Based Institutional Rankings: A Key Resource for Cross-Border Transfer and Equivalency Evaluations:** The AD Scientific Index's subject-based institutional rankings serve as a crucial reference for evaluating cross-border transfer or graduation equivalency applications. Universities may excel or fall behind in specific subjects, apart from their overall ranking. The AD Scientific Index provides a comparative global performance assessment of universities in each subject, making it a valuable indicator for equivalency or transfer applications.

Data Source Approach

Ranking organizations rely on leading databases like Scopus (Elsevier), Web of Science (Clarivate Analytics), Google Scholar, and Nature Index for publication and citation analysis. Each of these databases offers unique strengths in evaluating academic performance, but they also come with certain limitations. Our Approach: We value ranking both institutions and individuals, and we adopt a methodology that is global, practical, and more inclusive. While maximizing the strengths of our chosen data source, we are mindful of its inherent limitations. To address these, we implement strategic approaches and continuously audit the data to enhance accuracy. By recognizing the limitations of our data source, we apply effective monitoring tools to mitigate these issues. These tools help us identify and correct errors, ensuring ongoing improvements in data quality. During this process, more attention has been given to nearly one million individual profiles, comprehensive data cleansing has been carried out, and many profiles have been deleted. Our focus is not only on the correct usage of existing data but also on the continual enhancement of its quality.

In summary, our methodology is built on a global and inclusive perspective, optimizing the strengths of our selected data source while addressing potential errors and limitations through robust auditing mechanisms. This approach ensures that our rankings are increasingly accurate, reliable, and meaningful at both individual and institutional levels.

How Often is the Ranking Updated?

The AD Scientific Index is updated regularly to ensure the rankings reflect the most recent academic achievements. New entries, deletions, corrections, and changes typically become visible within one to three days. The h-index, i10-index, and citation numbers in profiles are updated every 60 to 90 days. Data for the rankings is primarily collected from Google Scholar, with a strong emphasis on standardizing names, institutions, and other relevant data. Due to the vast amount of information and varying formats from different sources, data cleansing and updates are ongoing and meticulous processes. Contributions from users to enhance data accuracy are always welcomed, helping to maintain the reliability and relevance of the index.

How Can I Be Included in the List? The AD Scientific Index is continuously growing and currently includes 2.395.161 scientists from 24.352 institutions across 220 countries. While the list is regularly expanded, new additions are limited to individual and institutional registrations to ensure data accuracy and reliability. Please note that requests made via email or other communication channels are not considered. The only way to be included is by completing either an individual or institutional registration through the 'Register' link available on our website.

We do not have a policy of automatically including every profile in the system. This approach is necessary to manage the effort required to continuously ensure the accuracy, integrity, and validity of data at both the institutional level (e.g., mergers, splits, name changes, closures, license revocations, and suspensions) and the individual level (e.g., institutional changes, profile deletions, deaths, ethical violations, and other updates).

Who Can Be Included in the List and Reasons for Exclusion AD Scientific Index has included 2.395.161 scientists from 220 countries, 24.352 institutions, and 197 branches based on their publicly available Google Scholar profiles. *If you cannot find a particular name on the list, it does not diminish the scientific value of that individual; it simply means they do not appear on the list for various reasons.* However, there are several reasons why a scientist might not be included in the list:

1. **Technical and Resource Limitations:** While we aim to be as comprehensive as possible, it is technically and logistically impossible to include every researcher in the world. The large number of researchers at the individual level, along with factors such as deaths, retirements, frequent institutional changes, exclusions due to ethical violations, as well as mergers, name changes, closures, and the establishment of new institutions, creates a significant workload to keep the data up to date, making it challenging to ensure comprehensive coverage. To maintain data accuracy and currency, the expansion will be limited to registrations made through the Register link.
2. **Absence of a Google Scholar Profile:** Researchers who do not maintain a Google Scholar profile, or whose profile is not public, cannot be included in the index.
3. The scientist's **preference not to appear** on the list or their request to be removed from the list.

4. **Incomplete or Inaccurate Profile Information:** Profiles that lack sufficient information or contain irrelevant data may be excluded from the index. This ensures that the rankings are based on comprehensive and reliable information.
5. **Changes in Profile Visibility:** If a researcher's Google Scholar profile shifts between public and private settings or if there are inconsistencies in the data, the profile may be excluded during updates.
6. **Ethical Concerns:** Profiles found to contain unethical elements, such as misleading publication records or false membership information, and profiles with retracted articles will be removed from the index. Institutions are encouraged to monitor and verify the profiles of their staff to maintain academic integrity.
7. **Profile Deletion Due to Inaccessibility:** Profiles that become inaccessible during periodic updates or due to technical issues may also be removed from the list. Researchers are advised to regularly check and update their profiles to ensure continued inclusion.

Ensuring Ethical Integrity and Accuracy in Profile Information: The accuracy of profile information is an ethical responsibility of each individual scientist. To prevent the dissemination of misleading or inaccurate information, institutions, countries, and professional societies are encouraged to periodically review the profiles of their affiliated scientists. We place significant importance on addressing reports of incorrect, misleading, or ethically questionable profile information. Maintaining the integrity and reliability of the data within the AD Scientific Index is our top priority, and we reserve the right to remove profiles without notice, including those with paid registrations, if they are found to violate ethical standards, without issuing a refund.

Is it Necessary to Register to See Your Ranking? Registration is not required to find out your ranking in the AD Scientific Index. Scientists with similar h-index, i10-index, and citation counts will be ranked accordingly. However, registration is necessary to be included in the ranking with all its detailed elements.

Ranking Criteria

The AD Scientific Index employs a comprehensive and multi-dimensional approach to ranking scientists and institutions based on key indicators of academic impact:

- **Total h-index scores:** Reflects the cumulative academic influence of a researcher across their entire career.
- **Last 6 years' h-index scores:** Emphasizes recent academic productivity and impact.
- **Total i10 index scores:** Indicates the number of publications with at least 10 citations, showcasing the breadth of high-impact work.
- **Last 6 years' i10 index scores:** Focuses on recent high-impact publications, highlighting the researcher's productivity in recent years.
- **Total number of citations:** Measures the cumulative impact of a researcher's publications.
- **Number of citations in the last 6 years:** Highlights the recent citation impact of a researcher's work.

H-Index Rankings Criteria

H-index rankings assess the overall academic influence and impact of scientists within their respective fields. Researchers are ranked by their university, country, region, and globally based on their h-index, which captures both the quantity and quality of their scholarly output.

- *Primary Ranking:* The total h-index is the primary criterion.
- *Additional Factors, in order:* The last 6 years' h-index score, total i10 index score, and total number of citations are used sequentially.

i10 Index Productivity Rankings Criteria

i10 Index Productivity Rankings focus on identifying scientists who are particularly effective in producing high-value, highly-cited research.

- *Primary Ranking:* The total i10 index score is the primary criterion.
- *Additional Factors, in order:* The last 6 years' i10 index score, total h-index score, and total number of citations are considered sequentially.

Citation Rankings Criteria

Citation Rankings (Highly Cited Researchers) emphasize the recognition and influence of a scientist's work based on the total number of citations received.

- *Primary Ranking:* The total number of citations is the primary criterion.
- *Additional Factors, in order:* The number of citations in the last 6 years, total i10 index score, and last 6 years' i10 index score are used to further refine the rankings.

These criteria are applied to evaluations focused on the last 6 years. Institutions are also ranked according to these same criteria at the national, regional, and global levels, ensuring a thorough and accurate assessment of academic performance across different organizational contexts.

By applying these criteria across both long-term and recent time frames, the AD Scientific Index provides a comprehensive and balanced evaluation of a scientist's and institution's impact, offering a clear picture of their contributions to the academic community. Additionally, the **list without CERN, Statistical Data, etc.**, provided exclusively by "AD Scientific Index", is part of our effort to balance the situation created by CERN and researchers with statistical data, who have an advantage over others, especially those in the social and humanities fields. There is still much work to be done in this area.

Studies Influencing Ranking Due to High Citation Numbers For studies with an unusually high number of citations, such as those from CERN, ATLAS, ALICE, CMS, or those involving statistical data, guidelines, and updates, we have implemented a procedure to ensure fairness in the rankings. Authors of such papers are marked with an asterisk "*" at the end of their names to indicate this distinction. This helps maintain the integrity of the rankings by recognizing these studies appropriately without allowing them to disproportionately influence the overall results. Additionally, there is an option to view a list that excludes these types of studies to further ensure balanced rankings.

Why Are Last 6 Years' Ratios Important? The h-index, i10 index, and the ratio of citations in the last six years to the total number of citations are crucial metrics that reflect both the individual performance of scientists and the impact of institutional policies on the broader academic landscape. These ratios provide a clear indication of recent productivity and influence.

Subject Rankings: Which Subjects are Ranked in the AD Scientific Index?

The AD Scientific Index offers an unparalleled depth of analysis by categorizing academic

achievements into 197 sub-disciplines across various major fields of study. This level of detailed differentiation among sub-disciplines provides an analytical depth not commonly found in other academic ranking systems. The sub-disciplines have been defined based on the branches and departments within universities rather than research fields or areas of interest. This approach allows for a clearer categorization of academic activities and contributions, aligning more closely with the organizational structure and educational programs of universities. As a result, the unique characteristics and academic impact of each branch and department within the university can be more accurately and thoroughly analyzed by the AD Scientific Index.

- **Agriculture & Forestry:** 15 subfields
- **Architecture & Design:** 4 subfields
- **Business & Management:** 8 subfields
- **Economics & Econometrics:** 6 subfields
- **Education:** 11 subfields
- **Engineering & Technology:** 26 subfields
- **History, Philosophy, Theology:** 3 subfields
- **Law / Legal Studies:** 12 subfields
- **Medical and Health Sciences:** 80 subfields
- **Natural Sciences:** 6 subfields
- **Social Sciences:** 22 subfields
- **Social Sciences and Humanities:** 50 subfields
- **Art and Humanities:** 6 subfields

This meticulous categorization within the AD Scientific Index ensures that academic contributions are recognized in their specific contexts, offering a richer and more accurate depiction of scholarly impact.

Ranking Criteria for Universities

AD Scientific Index has developed its institutional ranking methodology based on the belief that the most valuable asset of an academic institution is its "Valuable and Productive Scientist," with all other aspects and processes being by-products of this core value.

We offer rankings that encompass all types of institutions, including universities, private universities, public universities, institutions, hospitals, and companies, as well as specific rankings within these relevant categories. For example, a private university can view its ranking within its country, region, and the world among all institutions, all private universities, and all universities.

Institutional rankings in the AD Scientific Index are determined by analyzing the distribution of scientists within the top 10%, 20%, 30%, 40%, 50%, 60%, 70%, 80%, and 90% of the institution's performance metrics. Institutions that have a greater number of scientists within these percentile bands achieve higher rankings. If two institutions have an equal number of scientists in a particular range, the next percentile range is considered. If the tie persists, the institution with the higher overall number of individual scientists is ranked higher.

The AD Scientific Index offers a unique and comprehensive platform for evaluating 24,500 institutions across multiple dimensions, including Total h-index, Last 6 Years h-index, Total i10 Index, Last 6 Years i10 Index, Total Citations, and Last 6 Years Citations. This in-depth analysis allows institutions to assess their strengths and identify areas for improvement by examining subject-specific and global percentile rankings. The AD Scientific Index's subject-based

institutional rankings serve as a crucial reference for evaluating cross-border transfer or graduation equivalency applications.

Young University/Institution Rankings

We present the Young University/Institution Rankings, evaluating universities, research institutes, companies, and hospitals established within the last 30 years that produce science and employ scientists. This ranking determines these institutions' place in the global scientific community, demonstrating that 30 years is a sufficient period to assess their development and impact. Our analysis aims to objectively identify the strengths and weaknesses of young institutions, helping them shape their strategies and formulate their policies.

Social Sciences and Humanities Rankings

The "Social Sciences and Humanities Rankings" is a unique ranking that consists of fields such as **Business & Management, Economics & Econometrics, Education, History, Philosophy, Theology, Law, and Social Sciences**. This ranking excludes areas such as **Medicine, Engineering, and Natural Sciences**, allowing for a more equitable assessment within the social sciences and humanities. As a result, individuals and institutions in these fields are evaluated based on their achievements without being overshadowed by the stronger disciplines of the natural sciences. You can find this in-depth ranking in this field exclusively on the AD Scientific Index, and explore it not only at the institutional level but also individually, based on H index, i10 index, and citation counts.

Art and Humanities Rankings

The "Art and Humanities Rankings" is a specialized ranking that includes fields such as **History, Philosophy, Theology, Linguistics and Literature, Archaeology, and Arts**. By focusing solely on these disciplines, this ranking provides a more balanced evaluation of individuals and institutions, ensuring that their achievements in the arts and humanities are recognized without being overshadowed by the dominance of fields like **Medicine, Engineering, and Natural Sciences**. This allows for a fairer comparison based on success within these creative and scholarly disciplines. You can find this in-depth ranking in this field exclusively on the AD Scientific Index, and explore it not only at the institutional level but also individually, based on H index, i10 index, and citation counts.

Pricing Policy

At AD Scientific Index, all of our services, including access to individual and institutional rankings on the main category pages, are offered free of charge. We provide the most comprehensive and useful academic data for scholars, institutions, regions, countries, and disciplines free of charge. Similarly, you can access the most extensive and valuable academic data for your institution and country at no cost. However, for those seeking more advanced features, we offer premium services with additional features on the premium page, where you can manage and customize your individual and institutional detail pages with password-protected access, all for a reasonable fee. *We would like to emphasize that premium registration will not change our strict deletion policy regarding unethical or misleading practices. This policy, which applies to all our users, is rigorously enforced to ensure the preservation of academic integrity.*

Free Services:

- You can directly access individual and institutional rankings through the main page links in the site header. Additionally, *the most comprehensive academic data, by far, which you can access without a password and free of charge for both individuals and institutions, is available on the AD Scientific Index.*

Premium Services:

- For a one-time fee covering three years, you can gain access to more comprehensive analyses and have the ability to input and modify your own data on the Scientist and Institution pages.
- Our premium services allow you to register, edit, and manage your rankings and data, giving you full control over your academic profile.
- Differentiated Pricing Based on Income Levels: To promote greater accessibility and equity, AD Scientific Index employs a differentiated pricing model based on the income levels of different countries. We understand that the financial capacity of institutions and individuals varies across different regions, and we are committed to ensuring that our services are available to as broad an audience as possible.

As an independent organization, AD Scientific Index is committed to providing our community with the best and most reliable academic ranking and analysis services.

Click here for individual and discounted institutional bulk registration.

Privacy- Data Policy: We respect your personal rights and your requests for the deletion of your data. For more information, please **click**

Contact

FAQ Frequently Asked Questions and Answers

Table I. Scientists in South Africa: Ranking and Analysis

#	Country	Country Region Rank	Country World Rank	Total Institutions	Total Scientist
1	South Africa	1	31	74	19047

Table II. All Types of Institutions in South Africa: Ranking and Analysis

#	Institution	Country Rank	Region Rank	World Rank	Country	Type of Institution	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
1	University of Cape Town	1	1	229	South Africa	Public	1874	62	241	435	629
2	Stellenbosch University	2	2	382	South Africa	Public	1918	36	151	307	480
3	University of the Witwatersrand	3	3	427	South Africa	Public	1922	36	131	282	415
4	University of Pretoria	4	4	488	South Africa	Public	1908	24	115	274	416
5	University of Kwazulu Natal	5	5	574	South Africa	Public	2004	20	95	224	321
6	University of Johannesburg	6	7	649	South Africa	Public	2005	12	80	177	274
7	North West University	7	9	824	South Africa	Public	2004	8	58	130	232
8	University of South Africa	8	18	1144	South Africa	Public	1873	8	35	86	166
9	University of the Western Cape	9	22	1198	South Africa	Public	1959	8	33	85	132
10	Rhodes University	10	24	1315	South Africa	Public	1904	4	29	77	115
11	University of the Free State	11	30	1600	South Africa	Public	1904	3	21	66	115
12	Tshwane University of Technology	12	40	1935	South Africa	Public	2003	1	16	37	63
13	South African Medical Research Council	13	48	2112	South Africa	Institution	1969	5	14	30	40
14	National Institute for Communicable Diseases	14	49	2135	South Africa	Institution	2002	4	14	24	35
15	Durban University of Technology	15	52	2190	South Africa	Public	2002	2	13	36	55
16	Council for Scientific and Industrial Research, South Africa	16	59	2280	South Africa	Institution	1945	1	12	38	75
17	Cape Peninsula University of Technology	17	65	2528	South Africa	Public	2005	1	10	33	63
18	University of Fort Hare	18	66	2537	South Africa	Public	1916	2	10	32	47

#	Institution	Country Rank	Region Rank	World Rank	Country	Type of Institution	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
19	University of Venda	19	92	3128	South Africa	Public	1982	0	7	21	40
20	Nelson Mandela University	20	102	3302	South Africa	Public	2005	2	6	27	47
21	Human Sciences Research Council of South Africa	21	108	3369	South Africa	Institution	1968	3	6	18	35
22	South African National Biodiversity Institute	22	112	3514	South Africa	Institution	2004	0	6	9	14
23	South African Astronomical Observatory	23	114	3549	South Africa	Institution	1972	2	6	7	7
24	University of Zululand	24	122	3686	South Africa	Public	1960	0	5	14	20
25	Africa Health Research Institute	25	128	3884	South Africa	Institution	2016	3	5	6	8
26	University of Limpopo	26	131	3932	South Africa	Public	2005	0	4	19	26
27	Central University of Technology	27	165	4538	South Africa	Public	1981	0	3	10	18
28	Sefako Makgatho Health Sciences University	28	167	4546	South Africa	Public	2014	0	3	10	19
29	South African Institute for Aquatic Biodiversity	29	180	4722	South Africa	Institution	2000	2	3	7	12
30	Agricultural Research Council, South Africa	30	194	5059	South Africa	Institution	1990	0	2	15	35
31	Walter Sisulu University	31	208	5190	South Africa	Public	2005	0	2	9	24
32	The Aurum Institute NPC	32	248	5921	South Africa	Institution	2002	1	2	3	4
33	Institute for Poverty Land and Agrarian Studies	33	251	5986	South Africa	Institution	1990	0	2	3	3
34	Vaal University of Technology	34	267	6247	South Africa	Public	1966	0	1	10	14
35	University of Mpumalanga	35	277	6360	South Africa	Public	2014	0	1	7	11
36	Foundation for Professional Development	36	362	7719	South Africa	Institution	1997	0	1	2	2

#	Institution	Country Rank	Region Rank	World Rank	Country	Type of Institution	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
37	Iziko Museums of South Africa	37	365	7796	South Africa	Institution	1825	0	1	2	2
38	National Metrology Institute of South Africa	38	403	8204	South Africa	Institution	2006	0	1	1	1
39	Da Vinci Institute	39	415	8378	South Africa	Institution	2002	0	1	1	2
40	National Institute for Occupational Health	40	418	8466	South Africa	Institution	1970	0	1	1	1
41	Belgium Campus Itversity	41	427	8566	South Africa	Private	1999	0	1	1	1
42	Mangosuthu University of Technology (Technikon)	42	442	9060	South Africa	Public	1979	0	0	4	12
43	Council for Geoscience	43	448	9120	South Africa	Institution	1912	0	0	4	6
44	Sasol	44	462	9332	South Africa	Company	1950	0	0	3	7
45	South African National Space Agency	45	511	9850	South Africa	Public	2010	0	0	2	4
46	South African Weather Service	46	528	10230	South Africa	Institution	2001	0	0	2	3
47	South African Sugarcane Research Institute	47	532	10302	South Africa	Institution	2008	0	0	2	2
48	Onderstepoort Veterinary Institute	48	533	10316	South Africa	Institution	1908	0	0	2	2
49	Sol Plaatje University	49	549	10500	South Africa	Public	2014	0	0	1	7
50	Citrus Research International	50	643	12044	South Africa	Institution	1960	0	0	1	2
51	Regenesys Business School	51	670	12483	South Africa	Private	1997	0	0	1	1
52	CenGen (Pty) Ltd	52	680	12621	South Africa	Company	2003	0	0	1	1
53	South African Reserve Bank	53	766	13545	South Africa	Company	1921	0	0	0	2
54	Milpark Business School	54	867	15098	South Africa	Private	1997	0	0	0	2
55	South African Radio Astronomy Observatory	55	886	15436	South Africa	Institution	1972	0	0	0	2

#	Institution	Country Rank	Region Rank	World Rank	Country	Type of Institution	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
56	Eskom	56	920	15972	South Africa	Company	1923	0	0	0	1
57	South African Theological Seminary	57	1010	17429	South Africa	Private	1996	0	0	0	0
58	Helderberg College of Higher Education	58	1023	17690	South Africa	Private	1893	0	0	0	0
59	Hartebeesthoek Radio Astronomy Observatory	59	1039	17983	South Africa	Institution	1961	0	0	0	1
60	Academy of Science of South Africa	60	1043	18166	South Africa	Institution	1996	0	0	0	0
61	Independent Institute of Education	61	1153	19879	South Africa	Private	2005	0	0	0	0
62	Richfield Graduate Institute of Technology	62	1201	20474	South Africa	Public	1997	0	0	0	0
63	St Joseph`s Theological Institute	63	1225	20708	South Africa	Institution	2010	0	0	0	0
64	National Zoological Gardens of South Africa	64	1247	20903	South Africa	Institution	1899	0	0	0	0
65	National Institute for the Humanities and Social Sciences	65	1258	21106	South Africa	Institution	2013	0	0	0	0
66	Cape Town Baptist Seminary	66	1269	21262	South Africa	Institution	1974	0	0	0	0
67	George Whitefield College	67	1334	22229	South Africa	Private	1989	0	0	0	0
68	National Library of South Africa	68	1337	22276	South Africa	Institution	1998	0	0	0	0
69	Council on Higher Education	69	1348	22378	South Africa	Institution	1981	0	0	0	0
70	Cranefield College	70	1379	22867	South Africa	Private	1946	0	0	0	0
71	Pepkor	71	1386	22932	South Africa	Company	1965	0	0	0	0
72	Dora Nginza Hospital	72	1395	23089	South Africa	Hospital	1955	0	0	0	0

#	Institution	Country Rank	Region Rank	World Rank	Country	Type of Institution	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
73	Management College of Southern Africa	73	1409	23267	South Africa	Private	1995	0	0	0	0
74	Frere Hospital	74	1500	24243	South Africa	Hospital	1881	0	0	0	0

Table III. Universities in South Africa: Comprehensive Ranking and Analysis

#	University	Country Rank	Region Rank	World Rank	Country	Type of Institution	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
1	University of Cape Town	1	1	210	South Africa	Public	1874	62	241	435	629
2	Stellenbosch University	2	2	346	South Africa	Public	1918	36	151	307	480
3	University of the Witwatersrand	3	3	387	South Africa	Public	1922	36	131	282	415
4	University of Pretoria	4	4	440	South Africa	Public	1908	24	115	274	416
5	University of Kwazulu Natal	5	5	506	South Africa	Public	2004	20	95	224	321
6	University of Johannesburg	6	7	576	South Africa	Public	2005	12	80	177	274
7	North West University	7	9	718	South Africa	Public	2004	8	58	130	232
8	University of South Africa	8	17	941	South Africa	Public	1873	8	35	86	166
9	University of the Western Cape	9	21	973	South Africa	Public	1959	8	33	85	132
10	Rhodes University	10	23	1061	South Africa	Public	1904	4	29	77	115
11	University of the Free State	11	29	1228	South Africa	Public	1904	3	21	66	115
12	Tshwane University of Technology	12	38	1440	South Africa	Public	2003	1	16	37	63
13	Durban University of Technology	13	48	1594	South Africa	Public	2002	2	13	36	55
14	Cape Peninsula University of Technology	14	57	1797	South Africa	Public	2005	1	10	33	63
15	University of Fort Hare	15	58	1805	South Africa	Public	1916	2	10	32	47
16	University of Venda	16	84	2164	South Africa	Public	1982	0	7	21	40
17	Nelson Mandela University	17	94	2264	South Africa	Public	2005	2	6	27	47
18	University of Zululand	18	110	2514	South Africa	Public	1960	0	5	14	20
19	University of Limpopo	19	117	2662	South Africa	Public	2005	0	4	19	26

#	University	Country Rank	Region Rank	World Rank	Country	Type of Institution	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
20	Central University of Technology	20	146	3049	South Africa	Public	1981	0	3	10	18
21	Sefako Makgatho Health Sciences University	21	148	3055	South Africa	Public	2014	0	3	10	19
22	Walter Sisulu University	22	182	3466	South Africa	Public	2005	0	2	9	24
23	Vaal University of Technology	23	233	4201	South Africa	Public	1966	0	1	10	14
24	University of Mpumalanga	24	240	4285	South Africa	Public	2014	0	1	7	11
25	Belgium Campus Itversity	25	368	5882	South Africa	Private	1999	0	1	1	1
26	Mangosuthu University of Technology (Technikon)	26	379	6212	South Africa	Public	1979	0	0	4	12
27	South African National Space Agency	27	437	6838	South Africa	Public	2010	0	0	2	4
28	Sol Plaatje University	28	467	7312	South Africa	Public	2014	0	0	1	7
29	Regenesys Business School	29	559	8874	South Africa	Private	1997	0	0	1	1
30	Milpark Business School	30	725	11020	South Africa	Private	1997	0	0	0	2
31	South African Theological Seminary	31	846	12978	South Africa	Private	1996	0	0	0	0
32	Helderberg College of Higher Education	32	857	13190	South Africa	Private	1893	0	0	0	0
33	Independent Institute of Education	33	962	14911	South Africa	Private	2005	0	0	0	0
34	Richfield Graduate Institute of Technology	34	1003	15447	South Africa	Public	1997	0	0	0	0
35	George Whitefield College	35	1107	16836	South Africa	Private	1989	0	0	0	0
36	Cranefield College	36	1139	17333	South Africa	Private	1946	0	0	0	0
37	Management College of Southern Africa	37	1162	17642	South Africa	Private	1995	0	0	0	0

Table IV. Public Universities in South Africa: Ranking and Analysis

#	University	Country Rank	Region Rank	World Rank	Country	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
1	University of Cape Town	1	1	182	South Africa	1874	62	241	435	629
2	Stellenbosch University	2	2	302	South Africa	1918	36	151	307	480
3	University of the Witwatersrand	3	3	340	South Africa	1922	36	131	282	415
4	University of Pretoria	4	4	390	South Africa	1908	24	115	274	416
5	University of Kwazulu Natal	5	5	448	South Africa	2004	20	95	224	321
6	University of Johannesburg	6	7	516	South Africa	2005	12	80	177	274
7	North West University	7	9	639	South Africa	2004	8	58	130	232
8	University of South Africa	8	17	826	South Africa	1873	8	35	86	166
9	University of the Western Cape	9	21	853	South Africa	1959	8	33	85	132
10	Rhodes University	10	23	929	South Africa	1904	4	29	77	115
11	University of the Free State	11	29	1072	South Africa	1904	3	21	66	115
12	Tshwane University of Technology	12	38	1242	South Africa	2003	1	16	37	63
13	Durban University of Technology	13	45	1361	South Africa	2002	2	13	36	55
14	Cape Peninsula University of Technology	14	54	1521	South Africa	2005	1	10	33	63
15	University of Fort Hare	15	55	1527	South Africa	1916	2	10	32	47
16	University of Venda	16	79	1799	South Africa	1982	0	7	21	40
17	Nelson Mandela University	17	89	1877	South Africa	2005	2	6	27	47
18	University of Zululand	18	102	2057	South Africa	1960	0	5	14	20
19	University of Limpopo	19	107	2158	South Africa	2005	0	4	19	26
20	Central University of Technology	20	130	2416	South Africa	1981	0	3	10	18
21	Sefako Makgatho Health Sciences University	21	132	2422	South Africa	2014	0	3	10	19
22	Walter Sisulu University	22	162	2701	South Africa	2005	0	2	9	24
23	Vaal University of Technology	23	203	3155	South Africa	1966	0	1	10	14

#	University	Country Rank	Region Rank	World Rank	Country	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
24	University of Mpumalanga	24	210	3206	South Africa	2014	0	1	7	11
25	Mangosuthu University of Technology (Technikon)	25	298	4243	South Africa	1979	0	0	4	12
26	South African National Space Agency	26	348	4606	South Africa	2010	0	0	2	4
27	Sol Plaatje University	27	369	4879	South Africa	2014	0	0	1	7
28	Richfield Graduate Institute of Technology	28	688	8716	South Africa	1997	0	0	0	0

Table V. Private Universities in South Africa: Ranking and Analysis

#	University	Country Rank	Region Rank	World Rank	Country	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
1	Belgium Campus Itversity	1	75	1827	South Africa	1999	0	1	1	1
2	Regenesys Business School	2	131	3234	South Africa	1997	0	0	1	1
3	Milpark Business School	3	193	4308	South Africa	1997	0	0	0	2
4	South African Theological Seminary	4	251	5370	South Africa	1996	0	0	0	0
5	Helderberg College of Higher Education	5	256	5480	South Africa	1893	0	0	0	0
6	Independent Institute of Education	6	303	6456	South Africa	2005	0	0	0	0
7	George Whitefield College	7	374	7467	South Africa	1989	0	0	0	0
8	Cranefield College	8	388	7719	South Africa	1946	0	0	0	0
9	Management College of Southern Africa	9	403	7866	South Africa	1995	0	0	0	0

Table VI. Young Universities in South Africa: Ranking and Analysis

#	University	Country Rank	Region Rank	World Rank	Country	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
1	University of Kwazulu Natal	5	5	506	South Africa	2004	20	95	224	321
2	University of Johannesburg	6	7	576	South Africa	2005	12	80	177	274
3	North West University	7	9	718	South Africa	2004	8	58	130	232
4	Tshwane University of Technology	12	38	1440	South Africa	2003	1	16	37	63
5	Durban University of Technology	13	48	1594	South Africa	2002	2	13	36	55
6	Cape Peninsula University of Technology	14	57	1797	South Africa	2005	1	10	33	63
7	Nelson Mandela University	17	94	2264	South Africa	2005	2	6	27	47
8	University of Limpopo	19	117	2662	South Africa	2005	0	4	19	26
9	Sefako Makgatho Health Sciences University	21	148	3055	South Africa	2014	0	3	10	19
10	Walter Sisulu University	22	182	3466	South Africa	2005	0	2	9	24
11	University of Mpumalanga	24	240	4285	South Africa	2014	0	1	7	11
12	Belgium Campus Itversity	25	368	5882	South Africa	1999	0	1	1	1
13	South African National Space Agency	27	437	6838	South Africa	2010	0	0	2	4
14	Sol Plaatje University	28	467	7312	South Africa	2014	0	0	1	7
15	Regenesys Business School	29	559	8874	South Africa	1997	0	0	1	1
16	Milpark Business School	30	725	11020	South Africa	1997	0	0	0	2
17	South African Theological Seminary	31	846	12978	South Africa	1996	0	0	0	0
18	Independent Institute of Education	33	962	14911	South Africa	2005	0	0	0	0
19	Richfield Graduate Institute of Technology	34	1003	15447	South Africa	1997	0	0	0	0

#	University	Country Rank	Region Rank	World Rank	Country	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
20	Management College of Southern Africa	37	1162	17642	South Africa	1995	0	0	0	0

Table VII. Institutions in South Africa: Ranking and Analysis

#	Institution	Country Rank	Region Rank	World Rank	Country	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
1	South African Medical Research Council	1	3	464	South Africa	1969	5	14	30	40
2	National Institute for Communicable Diseases	2	4	477	South Africa	2002	4	14	24	35
3	Council for Scientific and Industrial Research, South Africa	3	6	530	South Africa	1945	1	12	38	75
4	Human Sciences Research Council of South Africa	4	10	867	South Africa	1968	3	6	18	35
5	South African National Biodiversity Institute	5	11	918	South Africa	2004	0	6	9	14
6	South African Astronomical Observatory	6	12	937	South Africa	1972	2	6	7	7
7	Africa Health Research Institute	7	14	1030	South Africa	2016	3	5	6	8
8	South African Institute for Aquatic Biodiversity	8	21	1250	South Africa	2000	2	3	7	12
9	Agricultural Research Council, South Africa	9	24	1361	South Africa	1990	0	2	15	35
10	The Aurum Institute NPC	10	29	1507	South Africa	2002	1	2	3	4
11	Institute for Poverty Land and Agrarian Studies	11	31	1536	South Africa	1990	0	2	3	3
12	Foundation for Professional Development	12	45	1846	South Africa	1997	0	1	2	2
13	Iziko Museums of South Africa	13	46	1870	South Africa	1825	0	1	2	2
14	National Metrology Institute of South Africa	14	52	1921	South Africa	2006	0	1	1	1
15	Da Vinci Institute	15	54	1938	South Africa	2002	0	1	1	2
16	National Institute for Occupational Health	16	56	1956	South Africa	1970	0	1	1	1

#	Institution	Country Rank	Region Rank	World Rank	Country	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
17	Council for Geoscience	17	64	2040	South Africa	1912	0	0	4	6
18	South African Weather Service	18	75	2193	South Africa	2001	0	0	2	3
19	South African Sugarcane Research Institute	19	76	2206	South Africa	2008	0	0	2	2
20	Onderstepoort Veterinary Institute	20	77	2213	South Africa	1908	0	0	2	2
21	Citrus Research International	21	95	2404	South Africa	1960	0	0	1	2
22	South African Radio Astronomy Observatory	22	134	2711	South Africa	1972	0	0	0	2
23	Hartebeesthoek Radio Astronomy Observatory	23	154	2909	South Africa	1961	0	0	0	1
24	Academy of Science of South Africa	24	157	2953	South Africa	1996	0	0	0	0
25	St Joseph`s Theological Institute	25	180	3105	South Africa	2010	0	0	0	0
26	National Zoological Gardens of South Africa	26	183	3118	South Africa	1899	0	0	0	0
27	National Institute for the Humanities and Social Sciences	27	188	3163	South Africa	2013	0	0	0	0
28	Cape Town Baptist Seminary	28	195	3193	South Africa	1974	0	0	0	0
29	National Library of South Africa	29	203	3246	South Africa	1998	0	0	0	0
30	Council on Higher Education	30	205	3252	South Africa	1981	0	0	0	0

Table VIII. Companies in South Africa: Ranking and Analysis

#	Company	Country Rank	Region Rank	World Rank	Country	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
1	Sasol	1	3	663	South Africa	1950	0	0	3	7
2	CenGen (Pty) Ltd	2	7	992	South Africa	2003	0	0	1	1
3	South African Reserve Bank	3	9	1051	South Africa	1921	0	0	0	2
4	Eskom	4	10	1229	South Africa	1923	0	0	0	1
5	Pepkor	5	25	1875	South Africa	1965	0	0	0	0

Table IX. Hospitals in South Africa: Ranking and Analysis

#	Hospital	Country Rank	Region Rank	World Rank	Country	Founded	Scientists in World Top 3%	Scientists in World Top 10%	Scientists in World Top 20%	Scientists in World Top 30%
1	Dora Nginza Hospital	1	8	318	South Africa	1955	0	0	0	0
2	Frere Hospital	2	11	342	South Africa	1881	0	0	0	0