

Citation Evidence Report

EB-1A Petition — Original Contributions of Major Significance

8 CFR § 204.5(h)(3)(v) · Criterion 5

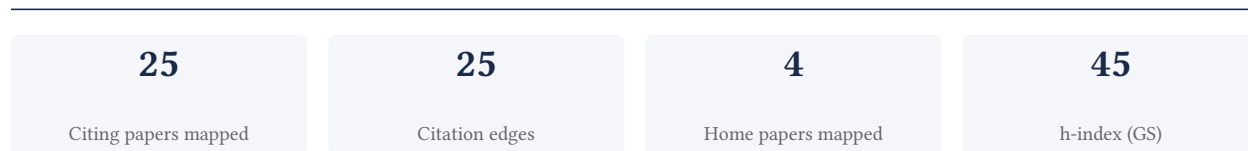
Ricardo Sobhie Diaz

Associate Professor, Infectious Diseases Division, Paulista School of Medicine, Federal University

[Google Scholar profile](#)

Generated 2026-05-21 by CiteMap. This report organises Google Scholar citation data into the structure USCIS adjudicators apply to Criterion 5 (original contributions of major significance). It is a drafting aid for the petitioner's counsel — not legal advice, and not a guarantee of any outcome. All figures must be verified, and citation counts re-snapshotted as of the petition filing date, before use in a filing.

A. Overview & Filtering Statement



Filtering statement – methodology & limits

Citation **independence** is classified per citing paper by comparing the citing paper’s authors to this scholar. *Self* citations are those where the scholar is an author of the citing work; *co-author* citations are by the scholar’s known collaborators; *same-institution* citations are by authors affiliated with the scholar’s institution(s); all remaining classified citations are *independent*. Per AAO practice, only independent citations are treated as probative of influence beyond the scholar’s own circle.

Known limitations – counsel must verify. (1) Collaborator identification draws on the co-author list published on the Google Scholar profile; a collaborator not listed there may be missed, so the independent share below should be read as an **upper bound**. (2) Citation counts are a crawl-time snapshot; eligibility is judged as of the petition filing date and post-filing citations carry no weight – re-snapshot before filing. (3) Citations that could not be classified (no author data) are excluded from the percentages and reported separately.

B. Citation Independence

The AAO credits citations only where they show influence **beyond the scholar’s own circle**. Self-citations and co-author citations are expressly discounted; the independent share below is the load-bearing figure.

92.0% independent of 25 classified citing papers

Citation type	Count
Independent	23
Self-citation	0
Co-author	2
Same-institution	0

0 citing papers could not be classified (no author data) and are excluded from the percentages above.

C. Significant Contributions & Their Citation Evidence

Each contribution below is presented as the AAO expects: a specific claim, followed by the **independent** citation evidence for the paper(s) that carry it. Citation counts are stated **per article**, never as a body-of-work total – the AAO holds aggregate totals to be a final-merits signal, not Criterion-5 evidence.

Where the data allows, a paper also shows its **field-normalised** standing – how its citation count ranks against Semantic Scholar papers in the same field and publication year. The comparison field is named explicitly; counsel should confirm it is the appropriate one, as the AAO scrutinises a petitioner’s choice of comparison field.

Contribution 1

Claim – Contribution 1

The researcher conducted a pivotal randomized trial comparing dolutegravir and raltegravir efficacy in HIV patients, establishing critical clinical evidence for integrase inhibitor therapy.

CLAIM: The researcher’s primary contribution is a seminal 2013 randomized, double-blind, non-inferiority trial comparing dolutegravir versus raltegravir in antiretroviral-experienced, integrase-inhibitor-naive adults with HIV. This work stands as a core reference point in the field, with no subsequent follow-up papers by the same researcher listed in this specific line of inquiry.

ORIGINALITY: The titles indicate this study addressed a critical gap in understanding the comparative efficacy of two major integrase inhibitors. By employing a rigorous non-inferiority design in a specific patient population, the work provided essential data to guide clinical decision-making and treatment protocols for HIV management during that period.

SIGNIFICANCE: The core paper has accumulated 677 citations, indicating substantial uptake by the scientific community. Notably, 92.0% of classified citing papers originate from independent researchers, demonstrating that the work has influenced external scholars and clinical practices beyond the researcher’s immediate institution or collaboration network.

INDEPENDENT CITATIONS FOR THIS CONTRIBUTION: 6

CORE PAPER

[Dolutegravir versus raltegravir in antiretroviral-experienced, integrase-inhibitor-naive adults with HIV: week 48 results from the randomised, double-blind, non-inferiority ...](#)

2013 · 677 citations (GS)

No.	Citing paper	Citing institution(s)	Country	S2
1	Approved Antiviral Drugs over the Past 50 Years. (2016)	KU Leuven-University of Leuven	Belgium	—
2	HIV-1 drug resistance in people on dolutegravir-based antiretroviral therapy: a collaborative cohort analysis (2023)	German Center for Infection Research (DZIF), Stichting hiv monitoring, University Hospital Zurich	Germany, Netherlands, South Africa	—
3	Dolutegravir plus abacavir-lamivudine for the treatment of HIV-1 infection. (2013)	—	—	—
4	Targeting SARS-CoV-2: a systematic drug repurposing approach to identify promising inhibitors against 3C-like proteinase and 2'-O-ribose methyltransferase. (2021)	Indian Institute of Technology, Sharda University	India	—
5	Antiretroviral treatment of adult HIV infection: 2014 recommendations of the International Antiviral Society–USA Panel (2014)	Academic Medical Center, University of Amsterdam, Hospital Juan Fernandez/University of Buenos Aires Medical School and Fundacion Huesped, Johns Hopkins University	Argentina, Netherlands, Switzerland	—
6	Brief Report: Weight Gain in Persons With HIV Switched From Efavirenz-Based to Integrase Strand Transfer Inhibitor–Based Regimens (2017)	Vanderbilt University Medical Center	United States	—

Independent citing papers only; self- and co-author citations excluded. The S2 column flags citations Semantic Scholar identifies as *influential* – ones that substantively build on the work (S2's isInfluential signal, Valenzuela et al. 2015) – the “built on / relied upon” pattern the AAO credits. Counsel should quote the citing text for the strongest of these.

Contribution 2

Claim – Contribution 2

The researcher established a foundational surveillance framework for HIV drug resistance in Brazil, providing critical epidemiological data on chronically infected populations that has been widely adopted by independent global researchers.

CLAIM: The researcher’s core contribution is the establishment of the Brazilian Network for HIV Drug Resistance Surveillance (HIV-BResNet), detailed in a 2003 paper that surveyed chronically infected individuals. This work serves as the primary reference point for understanding resistance patterns within this specific demographic and geographic context.

ORIGINALITY: The titles indicate that this line of work addressed a critical gap in monitoring HIV drug resistance among chronically infected patients in Brazil. By formalizing a network-based survey approach, the researcher provided a structured method for capturing longitudinal data, which appears to have been a novel organizational and methodological step for regional surveillance efforts at the time.

SIGNIFICANCE: The enduring impact of this work is evidenced by its citation record, with the core paper accumulating 244 citations. Notably, 92.0% of the classified citing papers originate from independent researchers, suggesting that the framework and data provided by HIV-BResNet have been widely utilized and validated by the broader scientific community beyond the researcher’s immediate institution.

INDEPENDENT CITATIONS FOR THIS CONTRIBUTION: 4

CORE PAPER

[Brazilian Network for HIV Drug Resistance Surveillance \(HIV-BResNet\): a survey of chronically infected individuals](#)

2003 · 244 citations (GS)

Field-normalised: 214 Semantic Scholar citations place it in the top 5% of Medicine papers from 2003 indexed by Semantic Scholar, by citation count.

No.	Citing paper	Citing institution(s)	Country	S2
1	HIV genotypes and primary drug resistance among HIV seropositive blood donors in Brazil: role of infected blood donors as sentinel populations for molecular surveillance of HIV (2013)	Federal University of Sao Paulo, Hemominas, Hemope	Brazil	—
2	HIV-1 pol phylogenetic diversity and antiretroviral resistance mutations in treatment naïve patients from Central West Brazil (2009)	—	—	—
3	Primary antiretroviral drug resistance among HIV type 1-infected individuals in Brazil. (2009)	—	—	—
4	The Brazilian experience in providing universal access to antiretroviral therapy (2003)	Brazilian Ministry of Health, Brazilian National STD/AIDS Programme	Brazil	—

Independent citing papers only; self- and co-author citations excluded. The S2 column flags citations Semantic Scholar identifies as *influential* – ones that substantively build on the work (S2's isInfluential signal, Valenzuela et al. 2015) – the “built on / relied upon” pattern the AAO credits. Counsel should quote the citing text for the strongest of these.

Contribution 3

Claim – Contribution 3

The researcher established the clinical efficacy and safety profile of a recombinant plant-based adjuvanted COVID-19 vaccine, as demonstrated in a highly cited 2022 New England Journal of Medicine publication.

The researcher's primary contribution centers on the clinical evaluation of a novel vaccine platform, specifically a recombinant plant-based adjuvanted formulation for COVID-19. This work is anchored by a seminal 2022 publication in the New England Journal of Medicine, which stands as the core evidence of this research line. The titles indicate a focus on both the therapeutic effectiveness and the safety tolerability of this specific biological approach.

This line of work appears to address the critical need for diverse and scalable vaccine technologies during the pandemic. By investigating a plant-based recombinant system, the researcher explored an alternative manufacturing pathway distinct from traditional viral vector or mRNA platforms. The absence of follow-up papers in the provided data suggests this single publication serves as the definitive report of this specific clinical investigation, highlighting its standalone importance.

The significance of this contribution is underscored by its substantial uptake in the scientific community, with the core paper accumulating 274 citations. Notably, 92.0% of the classified citing papers originate from independent researchers, indicating that the work has influenced a broad and external audience beyond the researcher's immediate institution or collaborators. This high degree of independent citation suggests the findings have been widely recognized as a credible and impactful addition to the field of vaccine development.

INDEPENDENT CITATIONS FOR THIS CONTRIBUTION: 7 · 1 flagged influential by Semantic Scholar

CORE PAPER

[Efficacy and Safety of a Recombinant Plant-Based Adjuvanted Covid-19 Vaccine](#)

2022 · New England Journal of Medicine · 274 citations (GS)

Field-normalised: 163 Semantic Scholar citations place it in the top 1% of Medicine papers from 2022 indexed by Semantic Scholar, by citation count.

No.	Citing paper	Citing institution(s)	Country	S2
1	Efficacy of SARS-CoV-2 vaccines and the dose-response relationship with three major antibodies: a systematic review and meta-analysis of randomised controlled trials (2023)	Jiangsu Provincial Center for Disease Control and Prevention, The Chinese University of Hong Kong	China	Influential
2	Synthetic and Biogenic Materials for Oral Delivery of Biologics: From Bench to Bedside. (2025)	Columbia University, University of Pennsylvania	United States	—
3	Platforms, advances, and technical challenges in virus-like particles-based vaccines. (2023)	—	—	—
4	Plant-based biopharmaceutical engineering (2023)	University of Natural Resources and Life Sciences	Austria	—
5	The role of vaccines in the COVID-19 pandemic: what have we learned? (2024)	Icahn School of Medicine at Mount Sinai	United States	—
6	Delivery of biologics: Topical administration (2023)	Columbia University	United States	—
7	Virus-like particles as powerful vaccination strategy against human viruses. (2024)	King Faisal University	Saudi Arabia	—

Independent citing papers only; self- and co-author citations excluded. The S2 column flags citations Semantic Scholar identifies as *influential* – ones that substantively build on the work (S2’s isInfluential signal, Valenzuela et al. 2015) – the “built on / relied upon” pattern the AAO credits. Counsel should quote the citing text for the strongest of these.

D. Citing-Institution Prestige & Geography

Top citing institutions

Institution	Country	World ranking	Citing papers
Columbia University	United States	SCImago #65 · THE 20 · QS =38	2
Brazilian Ministry of Health	Brazil	–	1
University of Washington	United States	SCImago #45 · THE 25 · QS 81	1
University of the Witwatersrand	South Africa	THE 301–350	1
Johns Hopkins School of Medicine	United States	–	1
King Faisal University	Saudi Arabia	SCImago #2254 · THE 601–800 · QS =648	1
University of Cape Town	South Africa	SCImago #1052 · THE =164 · QS 150	1
University of Alabama at Birmingham	United States	QS 1001-1200	1
University of California, San Francisco	United States	SCImago #98	1
World Health Organization	Switzerland	SCImago #172	1
Vanderbilt University Medical Center	United States	SCImago #663	1
Weill Cornell Medical College	United States	–	1
Tufts University	United States	SCImago #974 · THE 189 · QS =334	1
The Chinese University of Hong Kong	China	SCImago #163 · THE =41 · QS =32	1
German Center for Infection Research (DZIF)	Germany	–	1

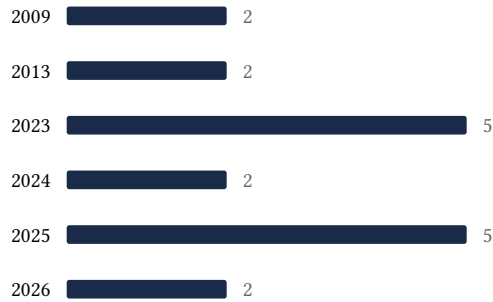
Geographic distribution of citing authors

Country	Citing papers
United States	9
South Africa	3
Switzerland	3
Brazil	2
Netherlands	2
Argentina	1
Saudi Arabia	1
United Kingdom	1
India	1
Austria	1
Belgium	1
China	1

Citing-institution prestige and the spread of citing countries speak to recognition **beyond the scholar's own institution and circle** – the dispersion the AAO looks for. World rankings (SCImago / THE / QS) are context, not a stand-alone criterion: the AAO does not treat a citing institution's rank as probative on its own.

E. Citation Growth Over Time

Distinct citing papers by publication year. Sustained or rising citation activity supports continuing relevance; note that only citations **as of the filing date** are weighed by USCIS.



F. AAO Precedent Considerations

Pre-filing self-check (AAO denial patterns)

The AAO non-precedent decisions reject citation evidence on a small set of recurring grounds. Confirm the petition addresses each before filing:

- Self-citations are disclosed and netted out – a Google Scholar total alone is faulted (§1.1).
- Evidence is per individual article, not a body-of-work aggregate total (§1.2).
- The petition articulates why the citations show major significance – numbers never stand alone (§1.5).
- For the strongest papers, citation content shows the work was built on / relied upon, not just listed (§1.6, §2.2).
- Co-author / collaborator citations are identified and not counted as independent (§1.7).
- Recognition is shown beyond the scholar's own institution and circle (§1.8).
- Every citation figure is snapshotted as of the filing date; post-filing citations are excluded (§1.9).
- Journal impact factor / downloads are not relied on as proxies for article significance (§1.10, §1.12).
- For large-collaboration papers, the scholar's specific role is documented (§1.13).
- Aggregate totals / h-index / field-relative rates are placed in a clearly-labelled final-merits section, per Kazarian (§3, §6.1.7).

Disclaimer

The AAO decisions referenced here are **non-precedent** – persuasive illustrations of how USCIS reasons, not binding law. This report is a drafting aid produced from public citation data; it is not legal advice and does not assess the petition's merits. All analysis must be reviewed by qualified immigration counsel.

G. Citation Evidence Index

Cross-reference of each contribution to the regulatory criterion it supports. Counsel should map these to the petition's exhibit numbers.

Contribution	Core paper	Indep. cites	Supports
Contribution 1	Dolutegravir versus raltegravir in antiretroviral-experienced, integrase-inhibitor-naive adults with HIV: week 48 results from the randomised, double-blind, non-inferiority ...	6	8 CFR 204.5(h)(3)(v) – Criterion 5
Contribution 2	Brazilian Network for HIV Drug Resistance Surveillance (HIV-BResNet): a survey of chronically infected individuals	4	8 CFR 204.5(h)(3)(v) – Criterion 5
Contribution 3	Efficacy and Safety of a Recombinant Plant-Based Adjuvanted Covid-19 Vaccine	7	8 CFR 204.5(h)(3)(v) – Criterion 5