

Alexandria university measures of interdisciplinary science research success within applicable disciplines

Alexandria University have ways to measure interdisciplinary research success, but like many universities, these are often **implicit within broader research performance systems** rather than a single dedicated “interdisciplinary index.”

Here’s a clear breakdown tailored to your strategic/academic context:

1. Existing Measures (Direct & Indirect)

a) Publication-Based Metrics

Interdisciplinary success is typically captured through:

- **Scopus / SciVal indicators e.g.**
 - Field-Weighted Citation Impact (FWCI)
 - Publications in **multi-disciplinary journals**
 - Collaboration metrics across subject areas

- **Web of Science / InCites e.g.**
 - Category-normalized citation impact
 - Research across multiple subject categories

b) International & Cross-Disciplinary Collaboration

Indicators include:

- % of publications with:
 - international co-authors
 - authors from different faculties (e.g., medicine + engineering, public Health, Physical sciences and humanities)
- Joint research grants across departments in different Faculties including STEM, Humanities and health sciences

c) Funded Interdisciplinary Projects

Success is reflected in:

- Grants involving multiple faculties:
 - medicine + engineering (biomedical innovation)
 - environment + agriculture (climate resilience)
 - Blue energy
 - Climate change and sea level rise

- Participation in programs such as:
 - EU-funded projects
 - national innovation funds
 - collaboration with the industrial sector in all fields

d) Contribution to Global Challenges

Measured through alignment with:

- Sustainable Development Goals (SDGs) Especially:
 - Health (SDG 3)
 - Climate (SDG 13)
 - Water (SDG 6)
 - Energy (SDG7)

Direct impacts measured by :

- THE Impact Rankings
- Research impact (citations)
- Industry income (applied interdisciplinary work)

Institutional-Level Practices at Alexandria University

Based on current structures, interdisciplinary performance is reflected through:

- Research centers and units (e.g., environmental studies, medical research)
- Cross-faculty postgraduate programs
- Joint supervision of MSc/PhD theses
- Conferences combining multiple disciplines

Recommended Advanced Metrics

Core KPIs

- % of publications in **top 10% multidisciplinary journals**
- % of publications with **co-authors from ≥2 disciplines**
- Interdisciplinary FWCI
- Number of **joint grants across faculties**

Advanced Metrics

- Network analysis of co-authorship across departments
- SDG-linked research output
- Industry-linked interdisciplinary projects

Best Practice Benchmark

Leading universities measure interdisciplinarity through:

- Dedicated **interdisciplinary research institutes**
- Internal funding schemes for cross-disciplinary work
- Interdisciplinary citation mapping
- Societal impact metrics (policy, health outcomes, innovation)

Conclusion

✓ Alexandria University **does measure interdisciplinary research indirectly** through:

- publications

- citations
- collaborations
- rankings