

Response to National Competitive Grants Policy Review 2025 from a gender equity perspective

This response has been prepared by the QUT *Gender Equity, Diversity, and Inclusion in Research and STEMM Committee* with input from gender equity in research champions from across QUT. As a committee, we focus on identifying and overcoming barriers and challenges to achieving gender equitable participation, success, and wellbeing in science, technology, engineering, mathematics and medicine (STEMM) research. We were motivated to bring together a response as experts in both research leadership and gender equity, recognising that structural reform provides an unmissable opportunity to build a program with equity and excellence as core principles.

The ARC, government, and universities have shared goals for creating and supporting a diverse research workforce in Australia. However, there remain fewer women in Australia's research workforce than men (Kingsley *et al.*, 2025), particularly in STEM (Australian Government, 2024). The ARC has historically made choices to increase women's participation in research and representation in the National Competitive Grants Program (NCGP) — e.g., assessing Research Opportunity and Performance Evidence (ROPE), and weighting project over person. Here, we raise concerns about ways the proposed NCGP changes may disproportionately impact women and gender-diverse researchers, hampering progress toward gender equity goals.

We stand behind increasing all facets of diversity in research, recognising that intersectionality is critical and gender is non-binary, but here we focus mostly on the effects of women as a group who have historically faced barriers to participation in STEMM (Greider *et al.*, 2019).

Positive elements of proposed scheme for women

The proposal introduces some promising approaches to addressing gender inequity in research funding. Double-blind peer review will reduce unconscious biases. The Lead and Mentor awards earmarked for women and Indigenous Australians provide targeted support for historically marginalised researchers. Perhaps most significantly, embedded fellowships may encourage universities to take greater responsibility for hiring and providing stability — a crucial consideration for women in academia who often face more precarious employment conditions.

Depending on implementation, smaller research groups (likely arising from lower funding amounts), increased numbers of small grants, and a greater volume of smaller projects may directly challenge the traditional "superstar researcher" model that has historically disadvantaged women and early-career researchers. The move toward team-based funding models rather than stand-alone fellowships can reframe research success from an individual achievement to a collaborative endeavour, creating pathways for PhD students and emerging researchers to benefit from funding relationships and professional networks that have traditionally been difficult to access.

Recognising mentoring as a key career dimension elevates mentoring from an informal, often uncompensated activity to a formally acknowledged professional achievement. If resourced and lauded, the scheme could spark a cultural shift toward inclusive, intentional mentorship.

Concern 1: Missed opportunities in this significant redesign

We have identified some missed opportunities in the current proposal. Some of these may be addressed when the details of the proposal are further elaborated, while others may have been overlooked entirely. We outline all missed opportunities here to ensure these issues do not fall from focus when further designing, specifying, and implementing the proposal.

The proposal **does not engage with evidence-based, data-driven program design and evaluation** for equity outcomes. The ARC is not the first funding agency to grapple with designing a competitive grants program with a view toward more equitable participation in research. The proposal does not engage with international reviews of best practice in increasing women's participation in research and their identified risks and recommendations (e.g., Horizon Europe's gender equality plans). There is no indication that the long history of data from current or previous ARC schemes has informed these plans. It is unclear whether past equity-focused reforms (e.g., gender targets in Laureate Fellowships, plans for the same in Discovery Early Career Researcher Award (DECRA) Fellowships, or the motivations for originally creating stand-alone fellowships) have been evaluated to inform these changes.

The proposal **misses opportunities to embed equity and reduce bias in funding structures** from the outset of the new program. The language used in the proposal leaves room for ignoring diversity goals, which we believe should be a “must” rather than a “should”, to ensure implementation continues to adhere to these goals. No formal, structural processes to ensure the integration of equity are considered — e.g., gender quotas, specific programs, assessing gender in teams. We are missing an opportunity to build transparency and diversity goals into panel composition. We are missing opportunities to establish processes whose goal is to entirely eliminate potential for bias in assessment, i.e., a lottery system.

The proposal misses **opportunities for improving participation and levelling the playing field around researcher assessment**. Future gender parity in Australian research funding will hinge upon increasing the low number of applications from women across all schemes — but there is no plan to tackle this issue. There is no mention of ROPE in its current or revised form. There is no discussion on how assessment panels and assessors will be trained to recognise and counteract biases in reviewing applications (e.g., gendered language, different career trajectories) like the mandatory implicit bias training modules of the Natural Sciences and Engineering Research Council of Canada (NSERC).

In the current proposal, there is **insufficient recognition of intersectional issues** – the notion that researchers who fall into multiple underrepresented categories experience compounding barriers that are more severe than summative effects. Neither is there a plan to mitigate these issues. It is also unclear how the proposed scheme accounts for non-traditional career paths or those with significant career disruptions (e.g., disability, chronic illness, caring responsibilities).

Concern 2: Embedded fellowships

Embedding fellowships within larger projects has the potential to reinforce existing hierarchies and increase the risk of patronage. Senior researchers — more likely to be men due to historical gender imbalances — would control access to fellowship opportunities. Biases, whether conscious or unconscious, may result in women being overlooked for embedded fellowships, their contributions undervalued, or relegated to subordinate roles within project teams.

Before DECRAAs were introduced, the early career stage was a significant source of gender inequity in the NCGP. Moving to an embedded fellowship model would represent a step backward at this critical career stage.

Gender disparities at Levels A and B can be largely outside of the direct control of institutions due to the discretionary hiring of postdoctoral researchers into research project teams. If the ARC later seeks to implement gender quotas or other measures to foster diverse cohorts of fellows, its ability to do so may be constrained by the additional layer of project-level decision-making associated with embedded fellowships (depending on implementation).

Embedding fellowships also limits a Fellow's ability to establish a record of independent innovation. Men lead more grants in the Australian NCGP than women (Kingsley *et al.*, 2025). Discovery Projects are disproportionately awarded to senior male academics — two thirds of successful lead investigators were male in DP25. An unintended consequence of this shift may be to transfer independence away from ECRs, increasing the accumulation of influence by giving established male research leaders the ability to act as arbiters of others' careers.

Concern 3: Lead & Mentor scheme

The Lead & Mentor scheme appropriately emphasises mentorship as a core responsibility of leading academic researchers. However, separating mentorship into a distinct category risks sending the wrong message — that mentorship is not an integral part of leading major research projects. Effective mentorship should be embedded within all research grants and fellowships, rather than only isolated into a lower-funding (and therefore potentially lower-prestige) program.

The description of the proposed scheme gives no insight into meaningful Key Performance Indicators for leadership and mentorship. Unlike research metrics such as publication numbers and grant income, mentorship outcomes are difficult to quantify. Without clear assessment criteria, there is a risk that traditional productivity-based metrics will be used instead, potentially undermining the broader goals of mentorship — such as fostering research impact and supporting career progression. There is also an opportunity to explicitly establish evidence of mentoring diverse researchers as a core element of the scheme.

The Lead & Mentor scheme has less funding than the current Laureate scheme. The existing women-only Georgina Sweet and Kathleen Fitzpatrick Laureate Fellowships have been highly successful in recognising women who are making profound, world-leading contributions to research. These prestigious named fellowships have elevated the profiles of exceptional researchers and enabled them to implement targeted initiatives to support women in academia. Under the proposed Lead & Mentor scheme, these fellowships will be retained at reduced funding levels and therefore perhaps with lower perceived prestige — effectively downgrading them from high-impact research fellowships to mentorship-focused roles.

This scheme may unintentionally place a disproportionate mentoring burden on women. It is well-documented that female academics take more mentoring responsibilities, often at the expense of their own research time. If not carefully structured, this scheme could exacerbate the issue by formalising an expectation that women should take on more emotional labour and service roles, without being scaffolded by the funding and prestige of a fellowship.

Concern 4: Short grant timeframes

Two years is too short a timeframe to establish meaningful research outcomes, publish results, build a competitive track record, or support career stability. In many cases, the first year of a research project is spent navigating approvals and recruitment. This leaves minimal time for conducting research and producing high-quality outputs.

Early-career researchers (ECRs) will be particularly affected by this shift, as they rely on sustained research projects to build their publication records and secure future funding. The improved gender representation often seen at the ECR level (as shown in the well-known scissor plots) risks being undermined if short-term funding structures disproportionately disrupt the career trajectories of women.

For women and carers, the compressed timeline poses an additional challenge. Shorter projects provide less flexibility for balancing research and personal commitments, reinforcing systemic barriers that have historically slowed the career progression of women in academia. The shift to two-year projects disincentivises parental leave for researchers of all genders, as there is little room within such a short timeframe for extended absences. This is a step backward at a time when the sector has made real progress toward supporting gender-equitable parental leave and work-life balance.

Concern 5: Reinforcing existing biases and amplifying gender disparities

Emphasising industry collaboration and national priority research areas across all schemes risks integrating potential gender bias in those areas into the NCGP, without the inclusion of specific measures to prevent this. Many industry sectors have deeply ingrained gender disparities, while industry collaborators bring their own biases to building collaborations. Similarly, national priority research areas can reflect existing gender imbalances by emphasising fields such as engineering, computer science, and defence-related research — historically male-dominated. For example, only 14% of lead Chief Investigators (CIs) in the LP24R1 Engineering, Information and Computing Sciences (EIC) panel were female. If most funding is tied to industry collaboration and national priority areas, these biases may be unintentionally reinforced — without the ARC having direct oversight or control.

International collaboration is a cornerstone of academic success, but women often face greater constraints on travel due to caregiving responsibilities and institutional barriers. Prioritising international connections without structural support for gender-equitable participation risks disproportionately benefiting male researchers, widening the gap in global research networks.

Embedding equipment and infrastructure into larger team grants risks consolidating access to research infrastructure within elite, well-funded groups. This disadvantages researchers — especially women — who are working outside of large programs, making them more dependent on patronage from senior academics. Access to infrastructure is critical for building independent research programs, and any move that further restricts this access could have long-term negative consequences for equity and career progression.

Recommendations for Improvement

- Use this opportunity to explore and implement innovative reforms such as gender quotas or a lottery approach
- Extend timeframes for fellowships
- Develop clear and inclusive mentorship assessment criteria
- Create explicit pathways for researchers returning from parental leave or alternative careers
- Conduct gender-sensitive evaluations of proposed changes

Citations

- Australian Government (2024). *STEM Equity Monitor Data Report 2024*. Australian Government Department of Industry, Science and Resources. <https://www.industry.gov.au/sites/default/files/2024-07/STEM-Equity-Monitor-data-summary-report-2024.pdf>, Accessed 10 April 2025.
- Greider, C. W., Sheltzer, J. M., Cantalupo, N. C., Copeland, W. B., Dasgupta, N., Hopkins, N., ... & Wong, J. Y. (2019). Increasing gender diversity in the STEM research workforce. *Science*, 366(6466), 692-695.
- Kingsley, I., Slavich, E., Harvey-Smith, L., Johnston, E. L., & Williams, L. A. (2025). Gender differences in Australian research grant awards, applications, amounts, and workforce participation. *Science and Public Policy*, scaf012.