Characteristics and outcomes of cancer nurse practitioner roles in Australia: An integrative systematic review.

Dr Carla Thamm, RN, PhD

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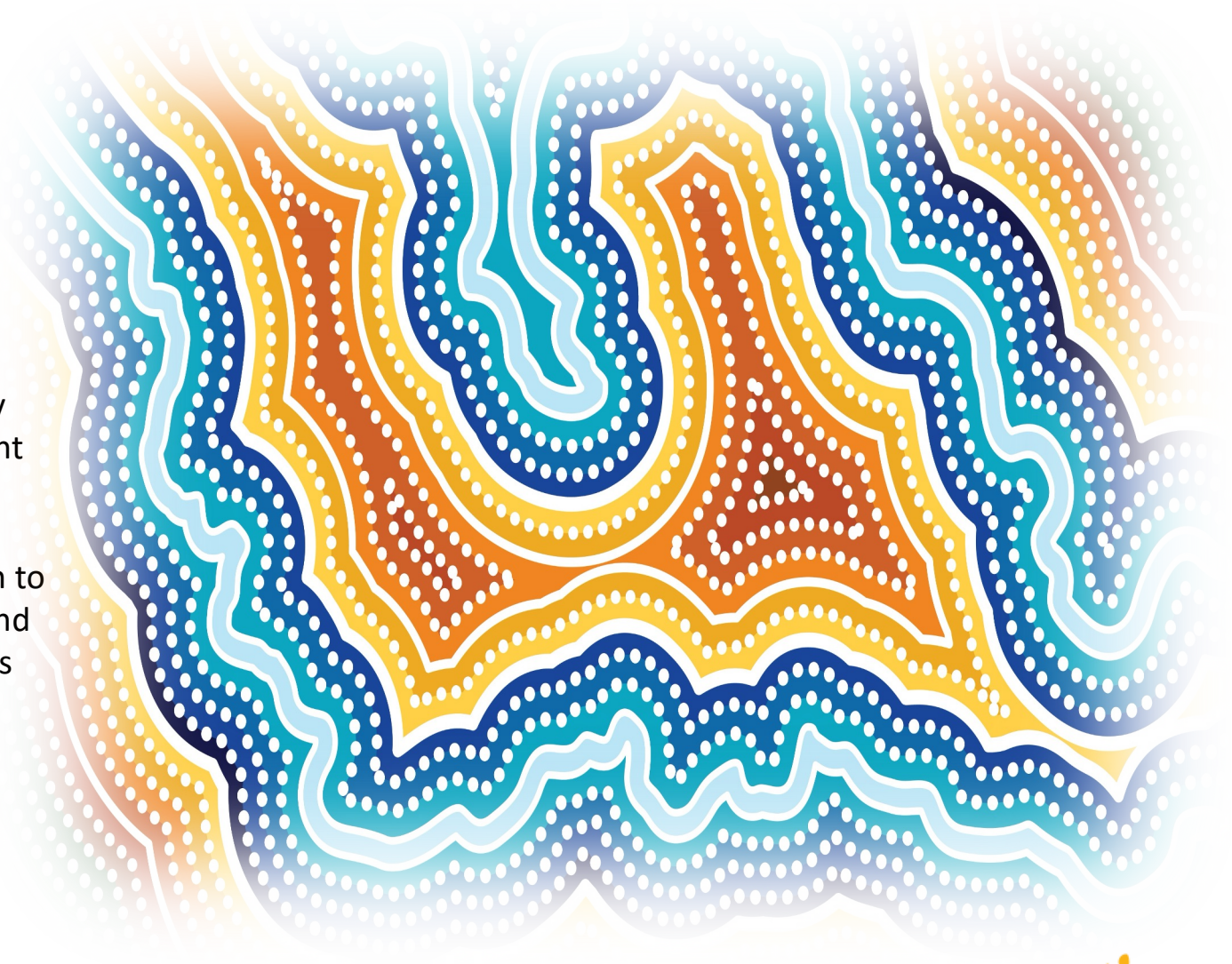
I would like to acknowledge the Traditional Custodians of the land on which we meet today, the Whadjuk people of the Noongar Nation, and pay my respects to their Elders past, present and emerging.

I recognise their continuing connection to land, waters and community, and extend that respect to all Aboriginal and Torres Strait Islander peoples here today.



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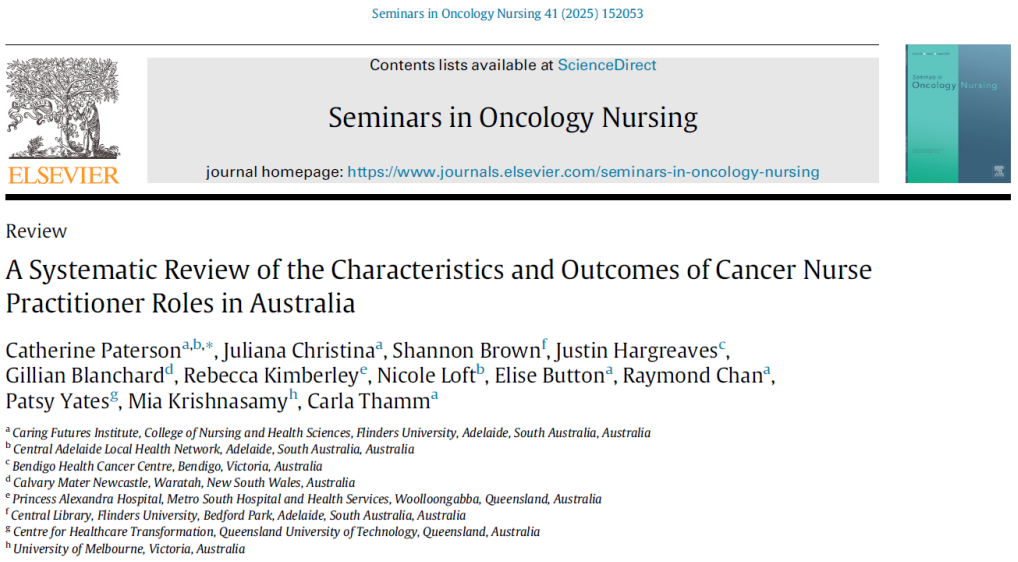

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Review

A Systematic Review of the Characteristics and Outcomes of Cancer Nurse Practitioner Roles in Australia

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THE PROBLEM

Cancer demand is rising. The workforce isn't keeping up.

Australia has released its national cancer plan (The Australian Cancer Plan), prioritising a capable, future-focused cancer workforce.

Yet the cancer nurse practitioner (NP) role, proven internationally, remains underdeveloped in the Australian system, despite over 1 million cancer survivors and rapidly growing demand.

> *Nurse-led models of cancer care deliver cost efficiencies, improve patients' quality of life, and leverage the full capabilities of the MDT.*
>
> *Chan et al., 2018*

>1M

Cancer survivors in Australia [1]

62

Cancer NPs nationally[2]

2,200

Total endorsed NPs (all fields)[3]

1. AIHW (Australian Institute of Health and Welfare) (2024) *Cancer*.
2. CNSA Workforce Survey (2025)
3. *Ahpra (2023), NP snapshot*

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WORKFORCE BY THE NUMBERS

Australia has fewer endorsed NPs than other comparable health systems.

USA

licensed nurse practitioners

385,000

(115 per 100,000)

Black (2023) AANP News

Canada

nurse practitioners

10,000

(22 per 100,000)

Canadian Institute for Health Information, (2024)

New Zealand

nurse practitioners

800

(16 per 100,000)

Nursing Council of New Zealand Quarterly Data Report, (2024)

Australia

all endorsed NPs (42 in cancer)

2,200

(10 per 100,000)

Ahpra (2023), NP snapshot

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THE AUSTRALIAN CONTEXT

Three system-level forces hold the cancer NP role back.

01 FUNDING

MBS & PBS still don't fit the NP scope of practice. Restricted reimbursement and prescribing rights make NP-led care unaffordable -- even where clinical scope is appropriate.

02 POLITICS

2024 statements from RACGP & AMA described NP-led models as "fragmented", "band-aid", and "another slap in the face" -- language linked to nurse burnout and psychological harm.

03 GOVERNANCE

Admitting rights, radiology requests, medical certificates, formularies and admin support vary by employer -- leaving NPs unable to work at full scope.

Paterson et al., (2025)

REVIEW QUESTION

What nurse practitioner roles exist in the Australian cancer care sector -- and what outcomes have they produced?

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HOW WE DID THE REVIEW

An integrative systematic review.

01 -- SCOPE

All study designs. Peer-reviewed publications of cancer NP roles in Australia, across the full cancer continuum.

02 -- SEARCH

Five databases searched from inception to August 2024. Two reviewers screened independently in Covidence.

03 -- APPRAISAL

Quality assessed using the Mixed Methods Appraisal Tool (MMAT 2018) by two independent reviewers.

04 -- SYNTHESIS

Narrative synthesis conducted by an experienced cancer nurse clinician-researcher and quality-checked by the full review team.

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WHAT THE LITERATURE SHOWS

A small but consistent evidence base -- and significant geographic gaps.

95
records screened

-->

16
assessed for eligibility

-->

8
included in review

STUDY DESIGNS

1	4	3
Qualitative	Quantitative	Mixed methods

WHERE THE EVIDENCE IS MISSING

All 8 publications: SA, NSW or ACT only. Zero rural, remote, or Aboriginal and Torres Strait Islander community settings.

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WHERE CANCER NPs WORK.

Across the entire cancer care continuum.

PREVENTION --> END OF LIFE -->

Health Promotion

Education, screening uptake, lifestyle & self-management support

Cancer Screening

NP-led colorectal & cervical screening for under-served populations

Advanced Diagnostics

Sigmoidoscopy, biopsy, consent, pathology interpretation

Acute & Emergency

Rapid review of toxicities, febrile neutropenia & oncological emergencies

Survivorship

Treatment summaries, care plans & transition to GP

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OUTCOMES -- ONCOLOGICAL EMERGENCIES

NP-led rapid review reduces ED presentations and shortens time to care.

-24%

ED presentations over 3 years (ACT)

McCavery 2020

5 min

Median wait time to NP rapid review

Cox 2013 / Oatley 2020

<30 min

Median consult duration (96% cases)

Cox 2013

70%+

Episodes managed independently by NP

McCavery 2020 / Cox 2013

Patient-Reported Experience Measures showed consistently high satisfaction with NP care across all included studies.
No included study performed a formal economic evaluation -- a clear evidence gap given substantial implied cost savings from avoided ED presentations.

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OUTCOMES -- SCREENING & DIAGNOSTICS

Procedural outcomes comparable to medically led care.

COLORECTAL SCREENING

NP-led flexible sigmoidoscopy clinic (Morcom 2005)

Autonomous NP referral, consent, procedure and biopsy, with histopathology interpreted and acted upon by the NP.

- Scope insertion depth comparable to medical colleagues
- Pathological findings consistent with expected rates
- 100% of patients satisfied with the procedure

CERVICAL SCREENING

NP-led women's health centre (Perks et al. 2017)

Feminist, holistic model serving refugee, marginalised and culturally diverse women.

- 23% of attendees identified as previously under-screened
- Patients reported strong trust, rapport and gentler experience
- Safe entry point for women who avoid mainstream care

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OUTCOMES -- SURVIVORSHIP CARE

The role works -- the system doesn't support it.

NP-initiated treatment summaries and care plans are core global practice -- but in Australia they consumed enormous time, largely chasing records across fragmented systems with zero administrative support.

MEDIAN

165

Minutes per patient

20-90 min

Populating the treatment summary from clinical records

45-90 min

NP-patient consultation

30-75 min

Finalising documentation and GP transition letter

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THE PATIENT VOICE

I felt like a special person and not just another patient being pushed through the motions... Very caring nature, much more gentle than procedures I've had in the past.

Patient -- NP-led colorectal screening clinic -- Morcom et al., 2005

"She just made you feel really comfortable... she really cared." -- Patient, cervical screening (Perks et al., 2017)

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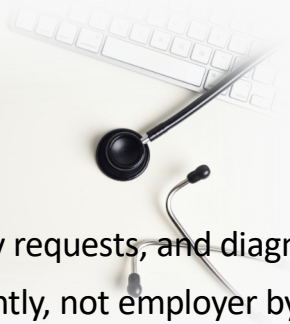
WHAT NEEDS TO CHANGE

Four enablers to let cancer NPs work at full scope.

01 Clinical Privileges

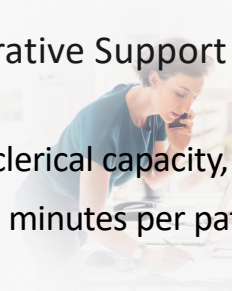


Admitting rights, radiology requests, and diagnostic workflow access -- granted consistently, not employer by employer.

02 Full Prescribing Authority

Appropriate PBS prescribing and MBS item access, so NP-led care is reimbursable and sustainable across public and private settings.

03 Administrative Support



Secretarial and clerical capacity, so NPs are doing NP work -- not spending 50 minutes per patient chasing fragmented records.

04 Recognition

Authority to issue medical certificates (including Centrelink), refer onward, and complete the full clinical episode of care.

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IMPLICATIONS FOR PRACTICE & RESEARCH

Where this evidence needs to go next.

Embed cancer NPs explicitly in the workforce ambitions of the Australian Cancer Plan -- align NP capabilities to national policy requirements.

Commission rigorously designed studies including formal economic evaluation -- every included study lacked one.

Extend the evidence base to be inclusive of the breadth of work NPs do across the entire cancer care continuum.

Build clinical-academic pathways so cancer NPs lead the research -- not only feature in it.

Advocate for core NP and collaborate models between health professionals to ensure scope of NP practice is optimised.

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The evidence base is small; the signal is consistent. We need to keep adding to the literature!

Cancer NPs are already part of the solution -- the system just needs to catch up.

Thank you!
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