

Fruitless Trees: A rapid scoping review of evidence for wound management in jungle environments

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BACKGROUND

Open wounds are a serious threat on jungle expeditions, and a field medic's first decision can affect both the wound's prognosis and the direction of the expedition. We set out to review wound management in these humid, high-infection environments, but found that even established guidance rests on thin evidence. A 2013 Cochrane review comparing primary with delayed closure of traumatic wounds identified no eligible randomised trials.¹ The Wilderness Medical Society's 2014 guideline strongly recommends that clean wounds can be closed up to 6 hours after injury, but grades the supporting evidence as low quality (1C) and does not address tropical conditions.² Military surgical doctrine, by contrast, has long advised against primary closure of war wounds in the field.³ We therefore conducted a rapid scoping review to establish where the evidence guiding wound closure in these settings comes from.

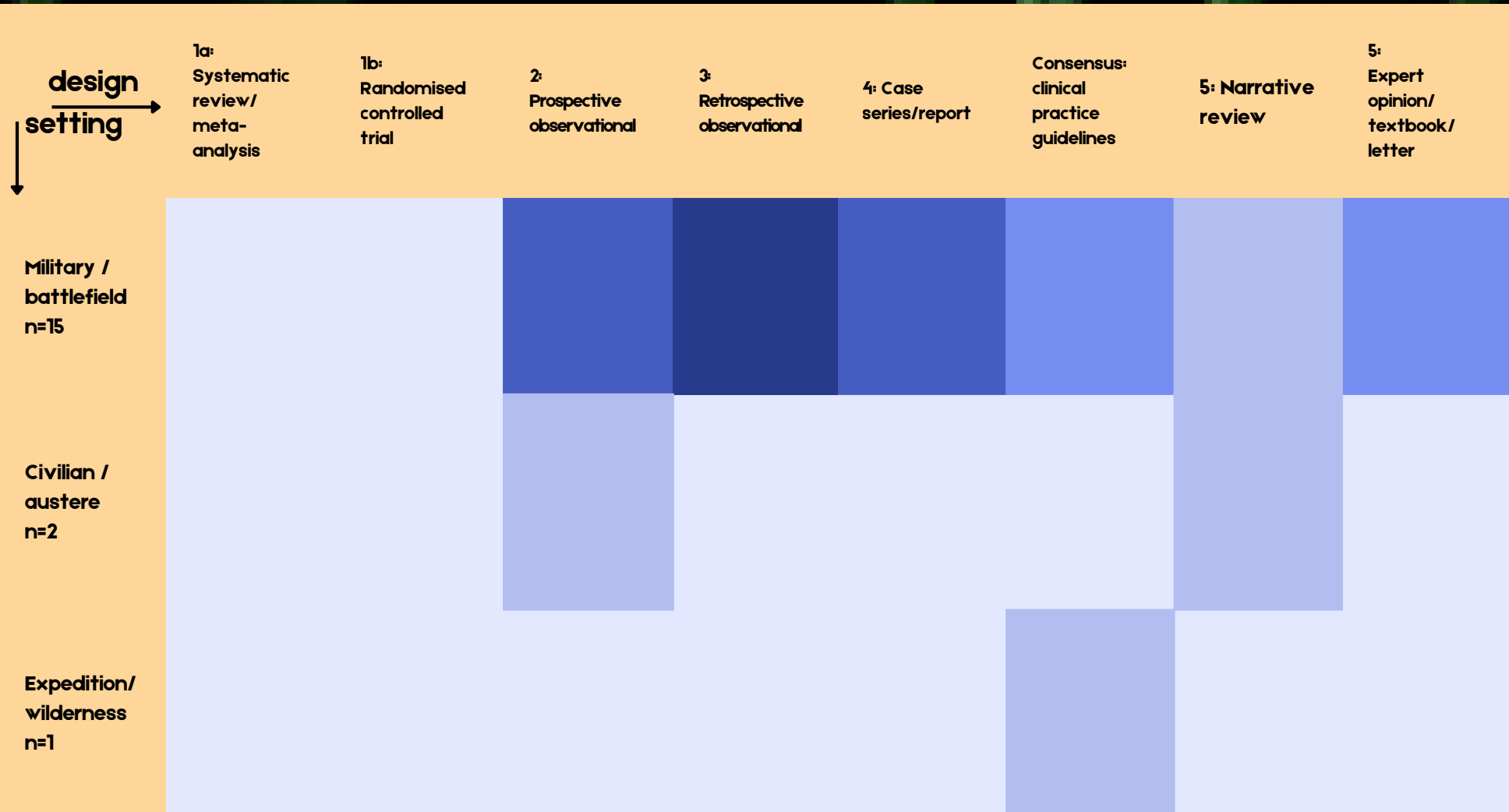
METHODS

	DEFINITIONS	INCLUSIONS	EXCLUSIONS
POPULATION	Human casualties of any age.	Acute soft-tissue injury.	Burns, surgical lesions and bite wounds.
CONCEPT	Timing of wound closure in field environments.	Infection and cosmetic outcomes or statements of clinical practice.	No closure-timing context.
CONTEXT	Wounds sustained in field settings.	Military, austere and jungle environments.	All other environments.

The following databases were searched systematically: MEDLINE via PubMed, Embase, the Cochrane Library, CINAHL and NTRL. Rapid scoping review (PRISMA-ScR)⁴; databases searched September 2026. Eligibility criteria defined before screening.

No studies addressed jungle or expedition settings. Current evidence is sourced predominantly from military fields.

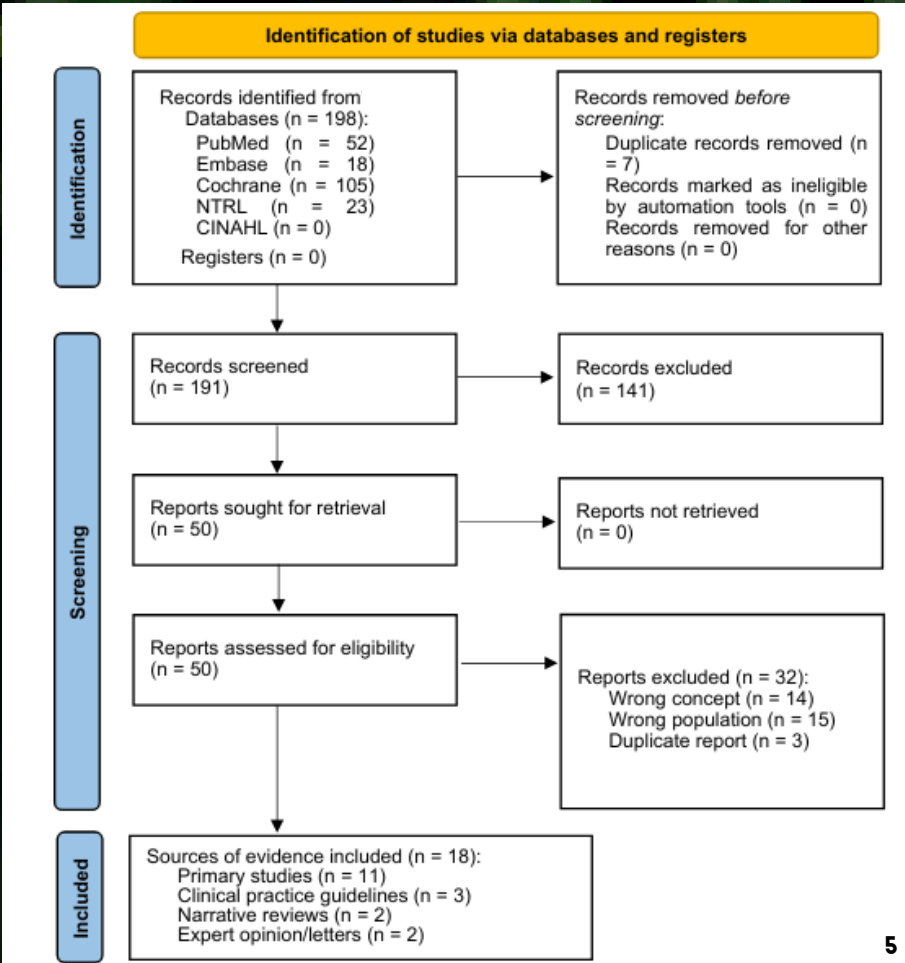
EVIDENCE MAP



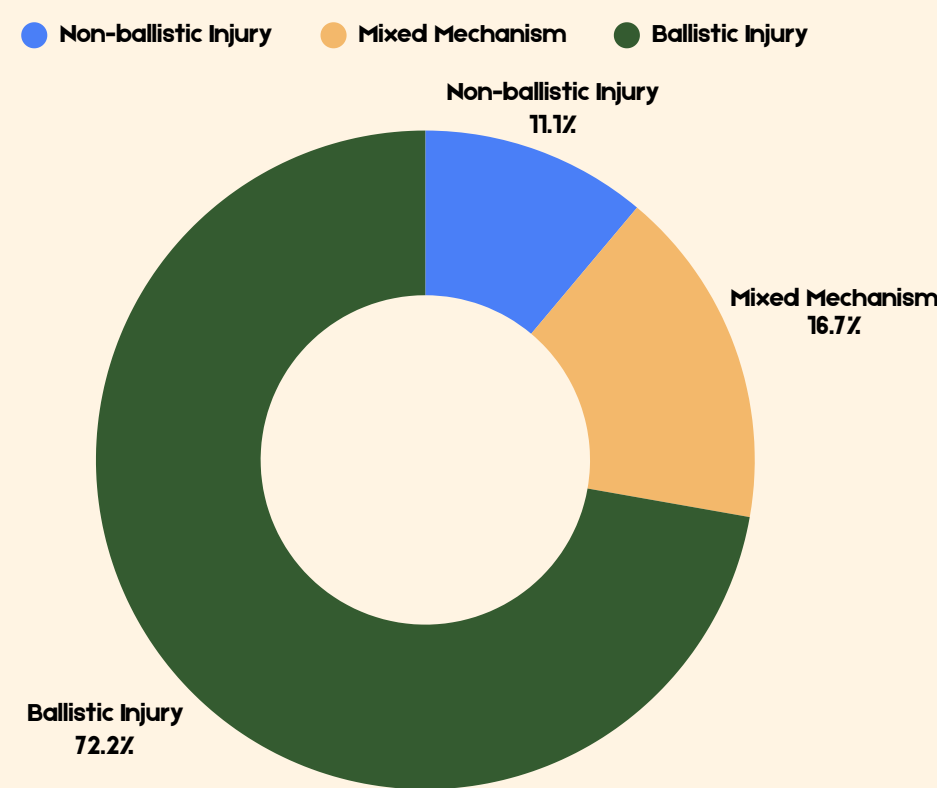
Frequency of papers found:



PRISMA FLOW AND CHARACTERISTIC SUMMARY



Injury characteristics:



RESULTS

18 sources were included: 11 primary studies, 3 clinical practice guidelines, 2 narrative reviews and 2 expert opinion pieces. 15 (83%) derived from battlefield settings, 2 from civilian austere settings and 1 from expedition/wilderness. No primary study addressed jungle environments. All wounds from primary studies were managed in clinical settings after evacuation.

CONCLUSIONS

No study addressed wounds managed in the field or in jungle environments. Of the 18 sources found in our rapid scoping review, 15 were derived from treating war wounds of either military personnel or civilians. All primary sources described closure in a medical facility after evacuation. Current recommendations, including the Wilderness Medical Society guidance on closure timing, therefore rest on thin evidence. Wound closure guidance for the jungle is borrowed from the battlefield and the hospital, not built from the field.

LIMITATIONS

- Eligibility focused on field-acquired wounds, which favours military sources; hospital-based civilian evidence was excluded by design.
- Search strings used modern terminology and may miss pre-1980 literature, which is poorly indexed and often lacks abstracts.
- NTRL may over-represent US military literature.

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