A scoping review of randomised controlled trials of vaccines that recruited care home residents: lessons for future trials

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Background

- Older care home (CH) residents are particularly vulnerable to infections and often experience adverse outcomes.
- Despite being prioritised for vaccination, they are largely excluded from vaccine trials.
- Their unique social and biological characteristics may influence vaccine effectiveness. Hence, it is crucial to test vaccines in this population. However, there are several challenges to recruiting CH to vaccine trials.

Aim

To identify all published randomised controlled vaccine trials that recruited care home residents and reported barriers and facilitators to successful recruitment and retention.

Methods

- Scoping review using the Joanna Briggs Institute methodology.
- EMBASE, MEDLINE, PsycINFO, CINAHL, and Cochrane Library, searched from 1990 to 2025.
- Three authors independently screened articles and extracted data.
- Results are reported as descriptive summaries.

Results

- Retrieved 701 articles and included 20 studies from 11 high-income countries.
- 7479 participants from 238 care homes were recruited in influenza (N=17) or pneumococcal (N=3) vaccine trials.
- Median sample size was 270, and the weighted mean age was 82.3 years.

Screen failure rate 70% (N=7 trials)

Main reasons were

- Declining participation: 46%
- Not meeting eligibility criteria: 27%

Dropout rate 8% (N=3 trials)

Primarily due to death 21%

Facilitators

Recruitment and data collection methods
(broader criteria, data from multiple sources)

Consent and assent factors
(lead-in time to contact relatives)

Collaboration with care homes
(agreement with care homes)

Barriers

Eligibility criteria and recruitment
(excluding residents with frailty, lack of capacity)

Consent and assent issues
(unable to reach relatives in time)

Ethical and regulatory concerns
(no established process, placebo-trial deemed unethical)

Care home-related factors
(objection from gatekeepers, infrastructure)

Study time frame and logistical factors
(short recruitment window, routine vaccination progammes)

Conclusions

- First review to report quantitative and qualitative evidence on barriers and facilitators to recruiting care home residents in vaccine trials.
- Identifies important strategies to facilitate involvement in the future.
- Raises important concerns about eligibility criteria and their application in vaccine trials.
- Improved inclusion and representation of this critical population will enable evidence-based decision-making.

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