

DEVELOPING THE DIABETES INPATIENT SAFETY CHECKLIST (DISC): A CO-DESIGN APPROACH TO STANDARDISING INPATIENT DIABETES CARE

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Background

Inpatient diabetes care is complex, and variation in practice can contribute to medication errors, inconsistent monitoring, and delayed escalation. Frontline staff frequently report challenges in managing diverse diabetes presentations within busy ward environments. To support safer and more standardised care, a multidisciplinary diabetes team developed the Diabetes Inpatient Safety Checklist (DISC), a structured tool designed to guide essential aspects of inpatient diabetes management.

Aim

To develop a practical inpatient diabetes safety checklist through a structured, collaborative co-design process involving clinical staff.

Methods

A structured co-design development approach underpinned the process. It incorporated multidisciplinary workshops, rapid-cycle prototype testing, and staff feedback from usability testing. Together, these activities ensured the tool aligned with inpatient workflows. The development process involved three stages. First, the multidisciplinary team designed and refined the checklist, ensuring alignment with clinical practice. Second, usability testing was conducted in ward settings with clinical staff, who commented on clarity, ease of use, and relevance to routine care. Their feedback informed iterative revisions to strengthen usability. Third, the refined checklist was reviewed by governance groups and shared across the Trust for final agreement.

Results

Staff across multiple wards described DISC as a helpful and practical tool for supporting inpatient diabetes care. Nurses reported that it was “very useful,” “a good prompt for junior nurses,” and “helpful when you don’t know the patient and need to get to grips with their diabetes care.” Receiving wards found it particularly beneficial for early assessment. Staff also contributed constructive insights, particularly around optimising the checklist for complex or atypical presentations. These contributions strengthened clarity and usability, and overall feedback remained highly positive, with several wards expressing interest in continued use. The

iterative co-design process strengthened clarity, usability, and alignment with real-world clinical workflows.

Conclusion

Through multidisciplinary collaboration and structured co-design, DISC was successfully developed as a practical, evidence-informed tool to support safer and more consistent inpatient diabetes care. The development process demonstrated strong clinical engagement and highlighted the value of collaborative design in addressing complex safety challenges.