The impact of a Pharmacist on Post take ward round prescribing and medication appropriateness.

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Prescribing is complex, high risk and involves multiple stages. Poor prescribing leads to worse patient outcomes and adverse drug events. Handover of care on admissions and the medication plan for optimisation occurs on the post take ward round (PTWR) where medication communication is suboptimal and not all actions decided are implemented.

Aim

We aimed to evaluate the impact of clinical pharmacist participation on the PTWR on medication prescribing compared to standard ward based clinical pharmacy services as measured by medication appropriateness, the level of medication communication and patient outcomes.

Methods

The intervention: a senior clinical pharmacist participated in the PTWR, as compared to usual care. PTWRs were observed during two six-week periods. Medication appropriateness was the primary study outcome assessed using START/STOPP indicators. Additional outcomes included medication communication, discussions that led to a change in therapy, risk of medication harm, patient readmission rates and length of stay.

Results

Observation of 130 patients occurred in the comparator and intervention cohorts across 23 and 20 PTWRs. Improvements in medication appropriateness were seen with an increased mean change in START/STOPP scores (0.3±0.87/pt to 0.43±0.88/ pt, p=0.049) as well as a greater overall proportion of patients who had an improvement (25.4% to 36.9%, p=0.004). The inclusion of a pharmacist led to a significant increase in the number of in depth discussions (1.9±1.7/pt to 2.7±1.7/pt, p<0.001), the number of those relating to high-risk medications (0.71±1.1/pt to 1.2±1.2/pt, p<0.05) and the number of discussions resulting in a therapy change (154 to 236). Health care outcomes including number of medications, length of stay or unplanned re-admissions were not impacted.

Conclusion

Clinical pharmacist participation on the PTWR leads to an increased level of medication-related discussions targeted at high-risk medications and improved medication appropriateness for patients.