

# Understanding Clinical Risk Levels in a Community Hospital Setting

John Dennis, AHP Consultant, South Ayrshire Health & Social Care Partnership  
Dr Stewart McKenna, Clinical Teaching Fellow, NHS Ayrshire and Arran

## Introduction

Understanding the risk status as a population within the rehabilitation and palliative care wards of a community hospital in readily accessible data terms in both medical and nursing / rehabilitation terms can be a complicated process. We have developed a new tool to allow easy auditing for risk status that improves the quality of data for decision making when modelling future services to meet future anticipated demographic and frailty service provision challenges.

### Current challenges are:

- Reduced cover from doctors at out-of-hours periods - covered by ANPs with an escalation to the duty consultant at the acute hospital.
- Increased levels of demand on Nursing and AHP staff providing rehabilitation and palliative care e.g. higher levels of acuity, rehab complexity, moving and handling or support for mental health related issues.
- That Consultant Geriatricians workloads to cover all beds at the Community hospital, manage OP and acute care work at other sites is extremely challenging.
- Challenges covering nursing shifts.

### Current hypotheses are:

- That Clinical risks at the Community hospitals remain high due to the frailty of the population and the variability in which the patient population present.
- That Consultant Geriatrician led care is required for all the clinical population within these beds.

## Aim

The aim is to generate meaningful data to allow understanding of the clinical risk levels in current the clinical care model and review opportunities to explore care modelling to best manage these risks and allow effective utilisation of the resources for Medical, Nursing and AHP skills, based on data of actual clinical risk as presented on the Community Hospital wards where the majority of people are older and have complex rehabilitation and care needs.

### Question?

From this data, can alternative care models be developed to allow 'medical-lighter' approaches to Community Hospital care utilising all professional staff, working at the limit of their scope of practice, to provide safe effective care?



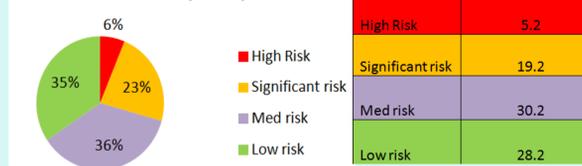
## Results

The Audit results has been generated in two main flows;

1. Clinical risk levels across the Hospital as a whole and at ward level
2. Individuals' risk journeys including risk variability, range and outcome of change in risk over the audit period.

- More than two thirds of people lie within medium to Low risk categories

Mean % Risk Categories across the Community Hospital



- 6% (5) people at any one time are medically unwell and present with issues that require frequent medical assessment / intervention.

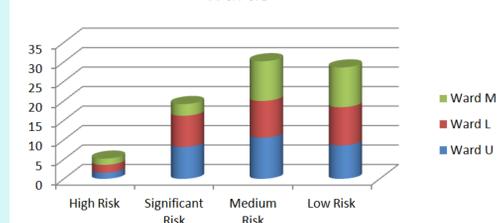
- 1/3<sup>rd</sup> of people remain at significant risk or greater across their rehab period and therefore need regular scheduled medical review.

- Low risks often also coincide with end of rehab term or delayed discharges

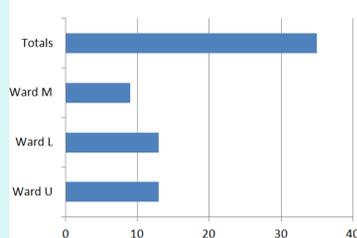
- Ward M has less reported significant risk levels due to Treatment Escalation Plans (TEPs) in place for all people in long-term (HBCCC) and End of Life care.

- Perceived risk less as nursing staff have a care escalation protocol to follow rather than refer to a senior clinical decision maker (consultant / ANP) for an unscheduled review.

Proportion of Risk Levels across wards



Increased Risk Mvts



- Over the audit period there was 35 events requiring unscheduled review by ANP or medical team resulting in escalations in medical risk categories representing either change in health status.

- Ward M had a lower escalation / bed ratio than other wards due to TEPs being in place. (0.36/0.43)

- Ward L which provides orthopaedic pathway (hip fracture majority) has the least variability in risk levels but similar mean risk
- Variability of risk levels during rehab and palliative care does vary significantly in many people which is a demonstration of the high frailty levels of the population within the community hospital
- Rehabilitation / medical care is effective in reducing peoples risk levels

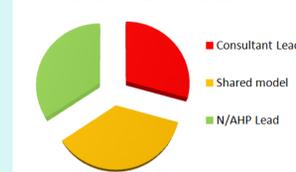
Risk Scores Over Audit period of Patients' Journeys



## Conclusions

- Up to 1/3<sup>rd</sup> of people could potentially receive care under an N/AHP led model where risks are medium to low and stable.
- Approx 1/3<sup>rd</sup> of people presented at higher risk levels and care should therefore be under medical lead.
- Potentially 1/3<sup>rd</sup> of people could be cared under a shared care model, e.g. medical consultants supported by sharing social care aspects of rehab / care under N/AHP lead.
- There was a nil score for High/Low category. This was attributed to the frailty of the population in the wards and if at medically at high risk, they usually present with significant risks for nursing and rehab staff as well

Risk Category Based Future Care Model?



- The 6% of people presenting at high risk should probably be retained within the acute setting if we are to provide a more medical-light model of care

## Method

- ❖ The audit tool used for this process was developed as a clinical risk matrix
- ❖ Adapted from standard risk assessment matrixes and previously tested and used in other speciality bed risk assessments by the authors.
- ❖ Is based on a risk matrix of Medical High to Low risks, cross-matched with Nursing & rehab risks High to Low to provide 9 categories for allocation.
- ❖ Using a PDSA cycle approach, 4 variations were tested and reviewed prior to final version used for the audit.
- ❖ Sense checked against an alternate audit process for medical risk
- ❖ Each Category contains specific criteria to aid including alignment to the Rockwood Frailty Score to improve the construct of category assignment.
- ❖ Each person in turn was assigned on a best fit attributed to the risk matrix. 5 audits across the wards were taken at roughly 2 week intervals.
- ❖ As in all matrixes there is a degree of overlap, therefore the nine categories are reduced by score banding to 4 primary categories of risk level, these being High, Significant, Medium and Low risk.



		Medical Risks		
		High (Rehab non-viable or v limited)	Med (Rehab viable)	Low (Rehab viable)
Nursing Care / Rehab Risks	High	18	12	6
	Med	12	8	4
	Low	6 (zero people identified)	4	2

**Acknowledgements:** Thanks to ward MDT for taking extra time out to discuss patients risk profiles in a new way

