HIPS/19/28 - Creating safe handover systems for the pre-hospital environment

Handover is the process of transferring vital patient information and responsibility for patients between healthcare providers. Poor handover of patients in-hospital is linked to patient harm, however we know little about the quality and safety of handover during pre-hospital emergency care: though its challenging and uncontrolled environment is likely to make the process even more error prone. To improve the survival of the most seriously ill and injured patients, Ambulance Crews (AC) are supported by pre-hospital Critical Care Teams (CCT). CCT usually arrive on scene after AC, requiring handover of extremely vulnerable patients from AC to CCT. This research will improve understanding of both the challenges and ways to help make handovers safer and more effective. We will do this by observing routinely collected video-recordings of actual pre-hospital handovers, interviewing AC and CCT, and reviewing 999 call data to identify gaps in communication between ambulance control and AC. We will then co-develop and test (through simulation) an intervention with AC and CCT to enhance handover quality and reduce the risks of patient harm. We will also meet with experts and people treated by AC CCT to agree the most appropriate way to implement and evaluate the intervention through future funding.