

InHouse Call: Streamlining Communication to Optimize Efficiency and Patient Care in a Hospital

Presenter: George Schilling, DO

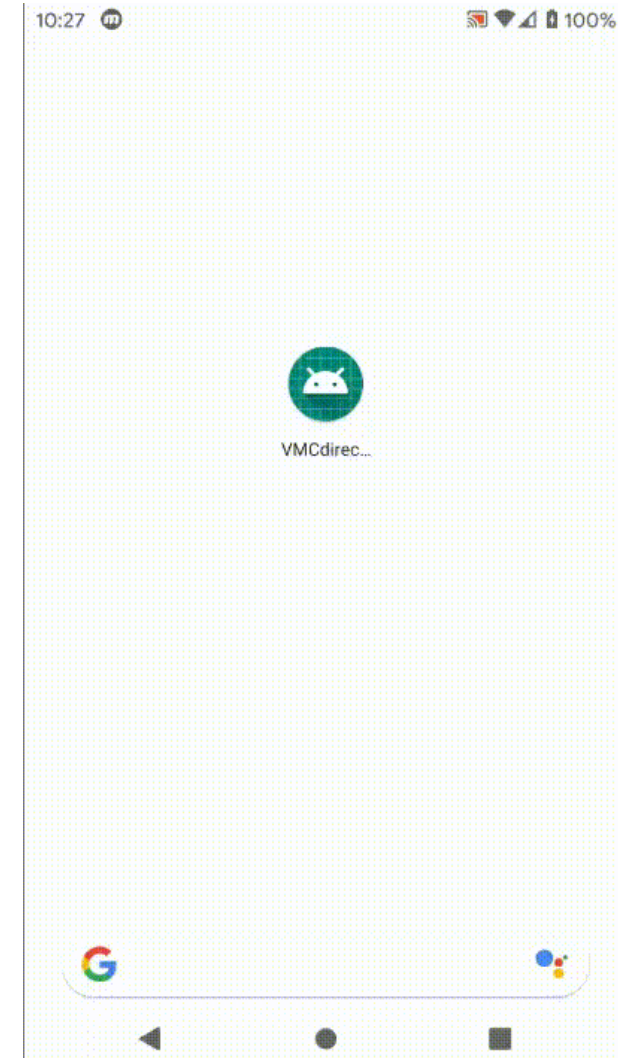
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Disclosures

- Owner of ProviderDirect, LLC
- Currently in third round of the ECU Pirate Entrepreneurship Challenge

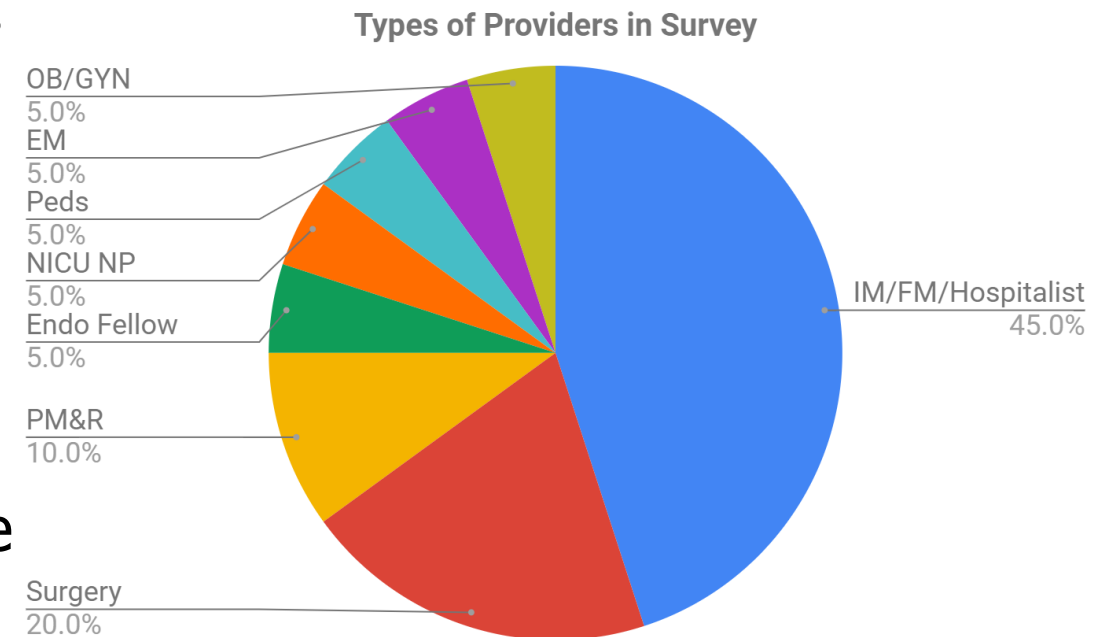
Introduction

- Poor hospital communication has been identified as a root cause of poor patient outcomes, fatal errors, and decreased time spent in direct patient care.
- The InHouse Call app was developed to address the need for improved hospital communication
- The aim of the project was to improve interprofessional communication by decreasing call time by 50%



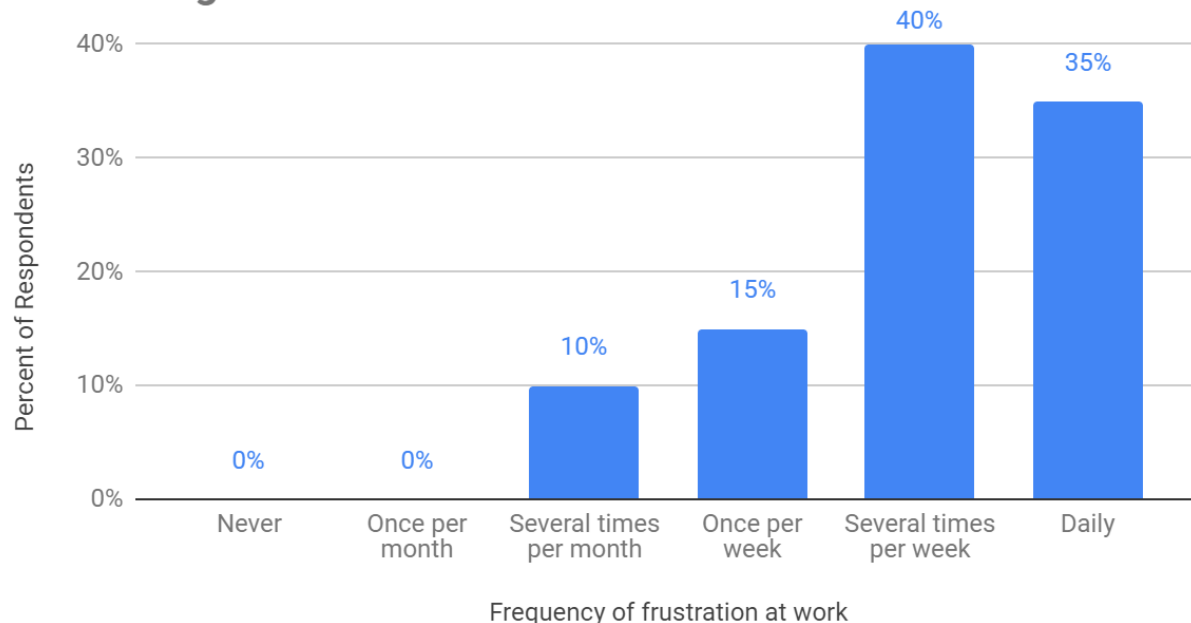
Methods

- A mixed-methods study was used to evaluate InHouse Call using a before-and-after survey methodology combined with objective timed trials
 - A convenience sample of 20 hospital clinicians were surveyed on hospital communication
 - They were timed to complete the task to call a healthcare team member (RN, ECHO dept, etc) using any traditional methods (switchboard operator, workstation sheet, etc)
 - They were then introduced to InHouse Call for 45-60 seconds and then timed to complete the same task using the app
 - Participants then completed an exit survey



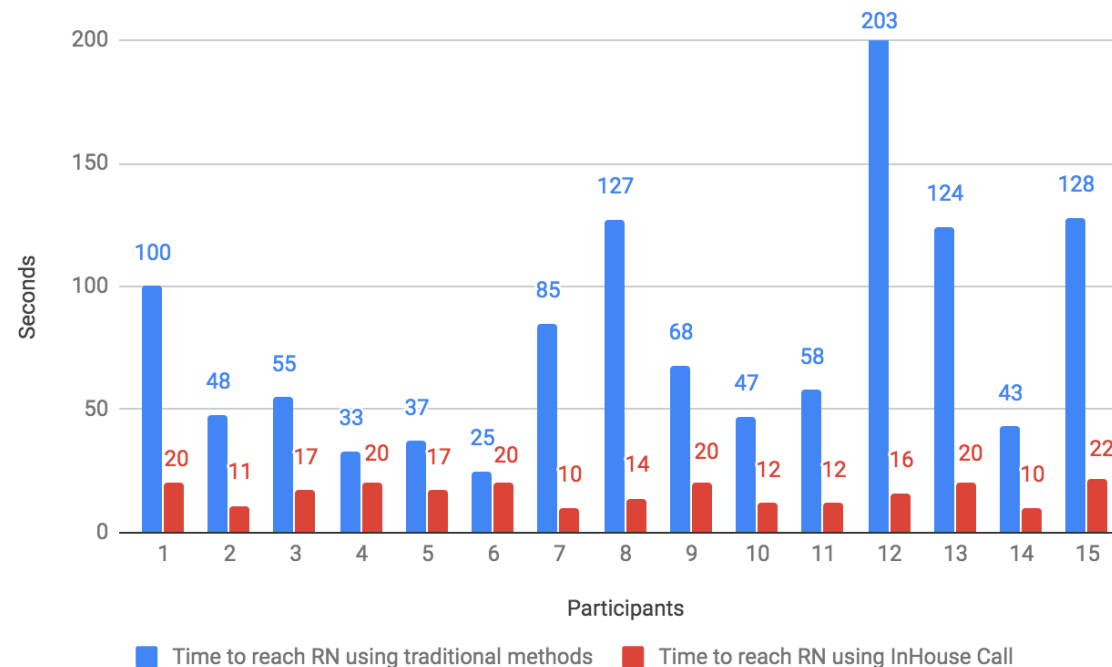
Results

How often do you get frustrated at work by not being able to find the right contact?



The baseline survey from revealed a significantly poor perception of the current hospital communication system - **75%** of respondents reporting frustration over not being able to find the right contact daily or several times per week, and **70%** reporting that poor communication impacted patient care and workflow daily or several times per week.

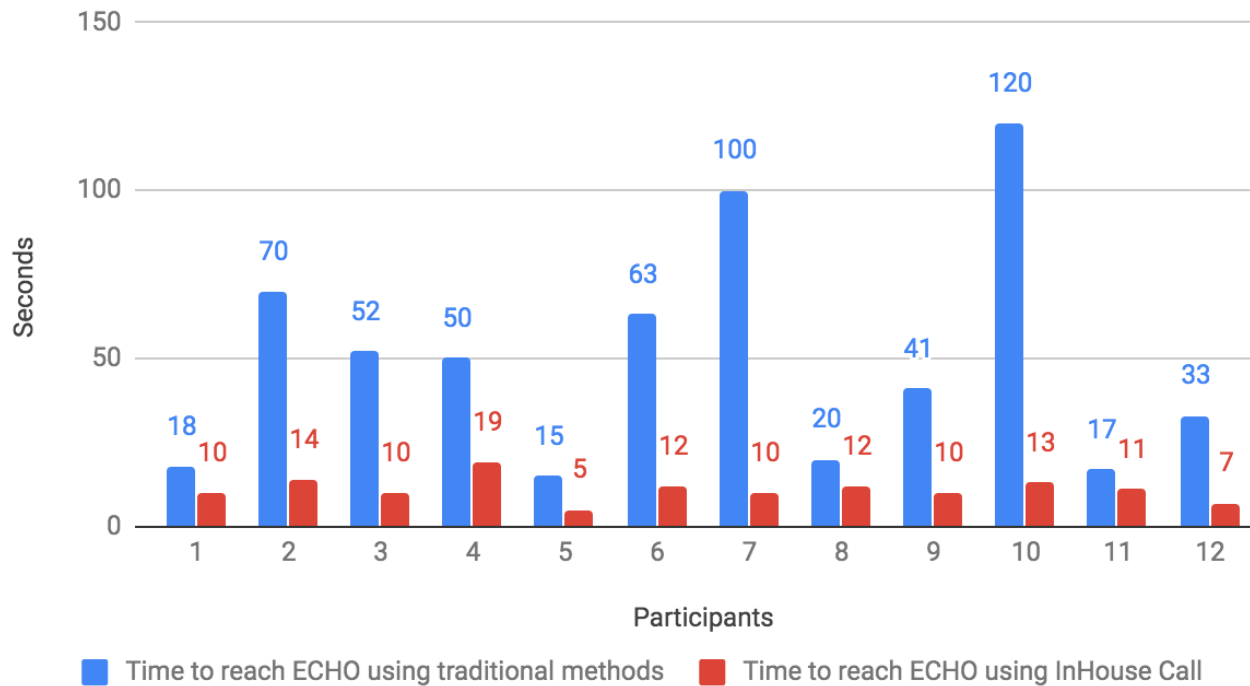
Time to reach RN using traditional methods versus InHouse Call



Out of 44 total timed trials, the average time spent to connect to the correct contact, via traditional methods was **73.5 seconds**, while the average time spent to connect to the correct contact via InHouse Call was **14.6 seconds**. By eliminating time-consuming steps, the average time saved utilizing InHouse Call was **58.93 seconds**, an 80% decrease.

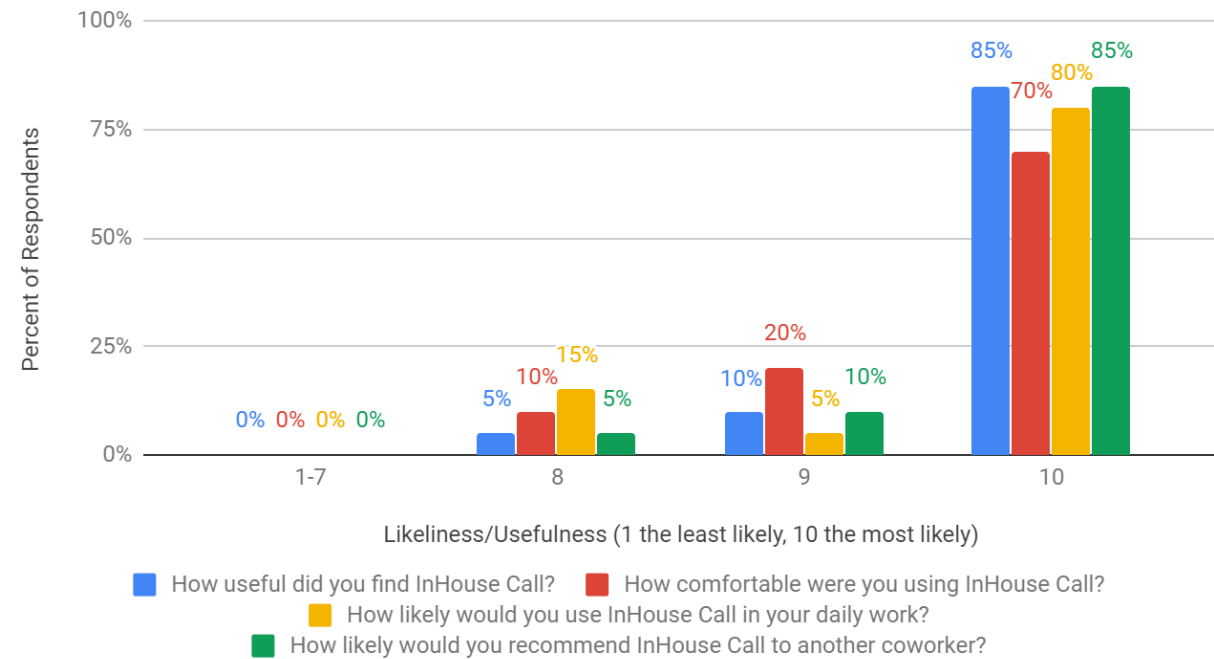
Results

Time to reach ECHO using traditional methods vs InHouse Call



The variability differed significantly. Calls using the traditional methods deviated from the mean by 40 seconds, while a call using InHouse Call deviated from the mean by only 4 seconds.

Exit survey results



The InHouse Call app was well received by its users and gave it an overall Net Promoter Score of 95, a powerful indicator of a user's overall satisfaction with a product and likelihood to recommend to others.

Conclusion

- Hospital communication negatively impacts patient care, clinician workflow, and is a source of frustration
- InHouse Call decrease the time to make a call in the hospital setting by 80% and significantly reduces variability between calls
- Users were highly satisfied with the app

A more thoroughly developed app (call through phone feature, improved search function, etc) would further improve InHouse Call's efficiency in the hospital setting