ABSTRACT

Title: Evaluation of the CARE Track after a Decade’s Experience: Teaching Population Health Skills to Pediatric Residents

Background: The United States spends more on healthcare than any other developed nation, yet on several population health measures we rank among the poorest nations. The American Academy of Pediatrics has issued specific policy statements defining its standards for pediatricians to engage in the community and address the social determinants of health affecting children. Yet, pediatrician involvement in the community is declining – a phenomenon that has been described as “Professional Failure to Thrive.” Research has suggested that higher self-perceived community health skill levels in residency contributes to greater community health involvement as practicing physicians. However, there is currently no research to show how best to teach these skills to residents.

The mandatory PLC Program at the University of Rochester has been shown to improve resident attitudes towards community pediatrics, but not competency in related skills. The CARE Track was implemented in 2001 as part of the Dyson Initiative to build off of PLC and teach residents the population health skills that will encourage them to engage in community-level care in their careers.

Objective: To assess the effectiveness of the CARE Track in teaching pediatric and medicine-pediatric residents population health skills.

Results: A statistically significant difference between the CARE and control groups was observed in 8 out of 10 community pediatrics skills ($P \leq 0.001$), with the CARE group reporting higher competency in each of these 8 skills. No difference was reported between the two groups in public speaking or in the ability to use computers and the internet to find information about public health issues.

No difference in the number of skills reported by the residents is observed at baseline between the CARE and No CARE groups (4.3 vs 4.1, $P=0.61$). After residency, the CARE group reported a greater number of skills on average than the No CARE group (7.2 vs 4.4, $P < 0.001$), with a corresponding greater change in number of skills (2.9 vs 0.3, $P < 0.001$). This change in skills for the CARE group between the baseline and final surveys was statistically significant ($P < 0.001$), while the slight change observed in the control group was not statistically significant ($P = 0.18$).

Conclusion: Residents who participated in the CARE program were more likely to report competency in population health skills than their peers in the control group. The CARE Track successfully teaches physicians skills that are important for community engagement and population health improvement. Initiatives like the CARE Track should be implemented in other residency programs to combat the growing “Professional Failure to Thrive” of US physicians.