

# Improving preferred ADHD medication prescribing in a large pediatric primary care network

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## background

- Partners For Kids (PFK), an accountable care organization (ACO) affiliated with Nationwide Children's Hospital (NCH) is responsible for improving health and lowering cost of pediatric managed Medicaid lives in 34 counties in central and southeast Ohio
- In 2011, national survey data reported 14.2% of children in Ohio were diagnosed with attention deficit/hyperactivity disorder (ADHD) by a health care provider of which half the patients took an ADHD medication<sup>1</sup>
- ADHD accounts for nearly a quarter of PFK's annual prescription drug expenditures
- Majority of the population cared for at NCH Primary Care Network (PCN) of clinics are PFK lives

## objective

- To optimize quality and cost-effective ADHD medication prescribing in a pediatric PCN through a multidisciplinary collaboration led by an ACO

## methods

### Setting:

- NCH network of 13 primary care clinics consists of 108 providers, which annually cares for over 75,000 patients

### Inclusion Criteria:

- All patients enrolled in an Ohio managed Medicaid plan who were prescribed an ADHD medication between January 2016 and March 2018 at any of the PCN clinics

### Implemented Interventions:

- Updated and published *Prescribing Guidelines for Behavioral Health*
  - A tool utilizing evidence-informed clinical guidelines, cost information, and expert consultation to assist providers with timely and effective treatment for children with ADHD
  - Medications are designated as preferred based on clinical efficacy, safety, and cost-effectiveness
- Formed multidisciplinary team consisting of individuals from PFK and PCN
  - Team set an aim to increase the rate of preferred ADHD medications for PFK members prescribed by NCH PCN providers from a baseline of 58% to 65% by 12/31/2017 and sustain for 6 months
- Presented prescribing guidelines and data to providers at provider meetings and medical residents at monthly meetings
- Shared prescriber-specific data and feedback (figure 1)
- Implemented outreach to targeted clinics (figure 2)
  - Medication therapy management (MTM) at two targeted PCN clinics with ambulatory pharmacists
  - Peer-to-peer messaging between physician champion at two targeted clinics to discuss prescribing guidelines, appropriateness, effectiveness, and safety

## methods

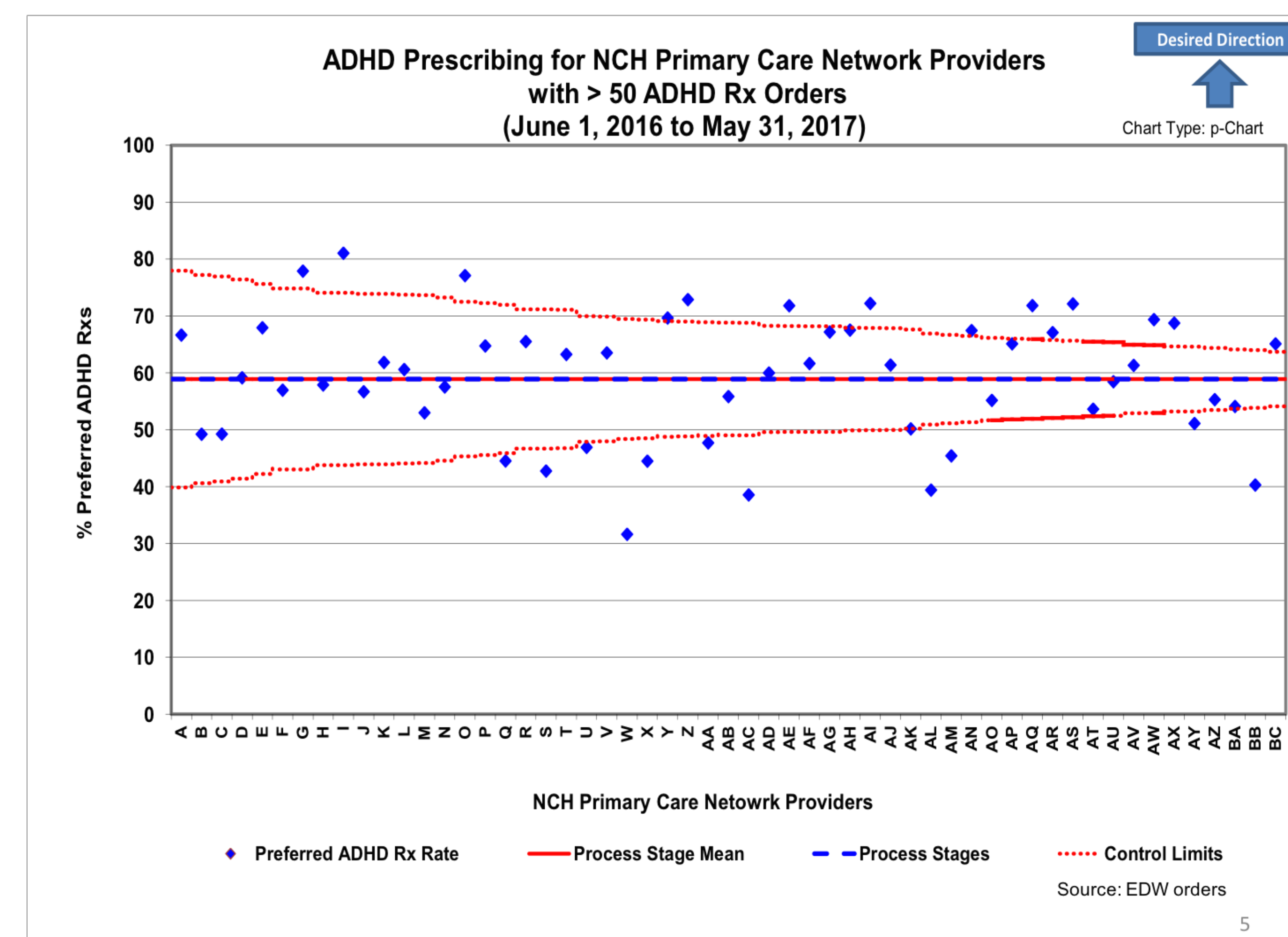


Figure 1. Providers' ADHD Prescribing

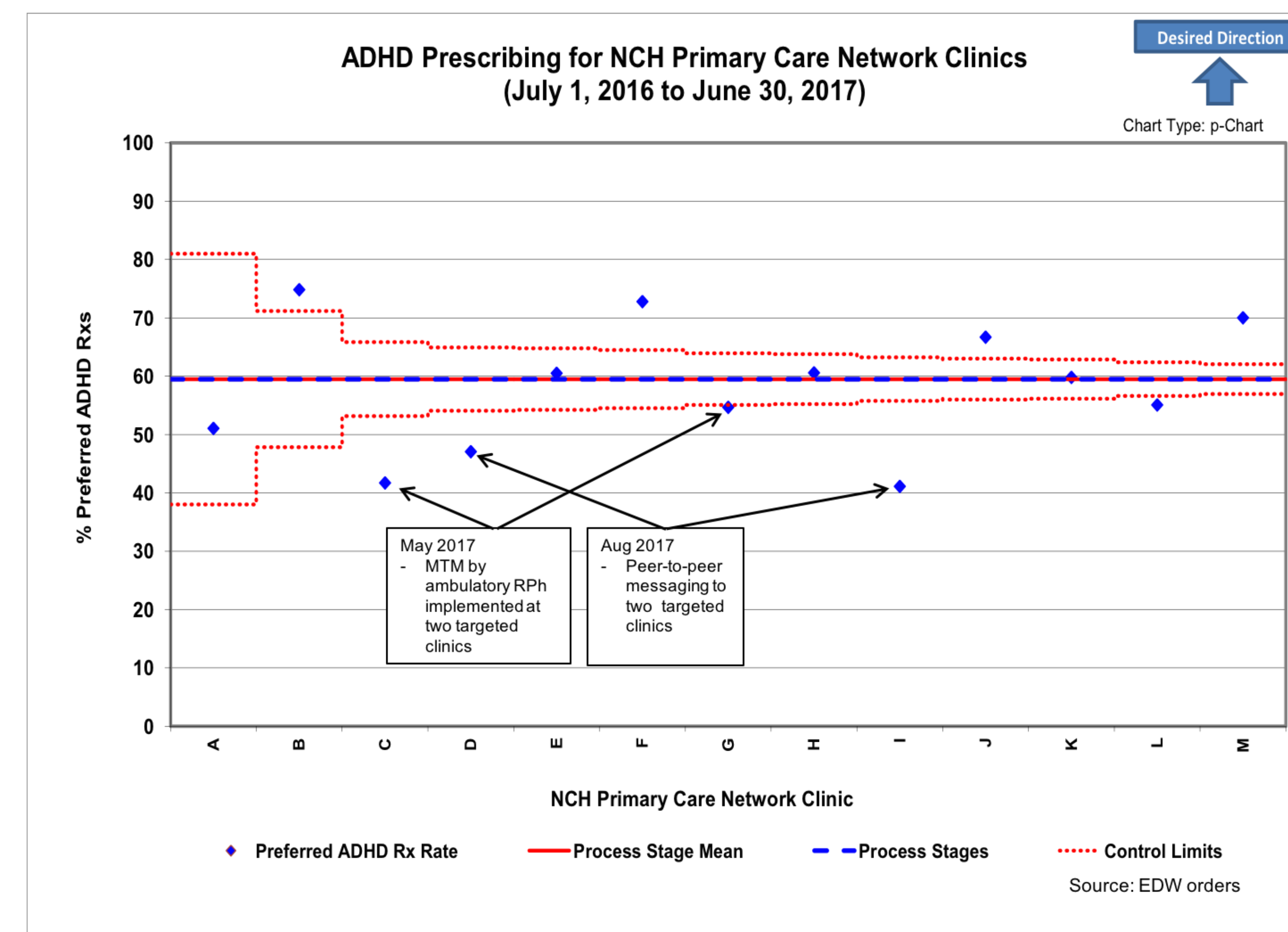


Figure 2. Clinics' ADHD Prescribing

## results

- Prescribing rates of preferred ADHD medications among PCN providers increased from baseline of 58% to 64% within five months of introducing the quality improvement (QI) interventions (figure 3)
- Improvements in preferred ADHD prescribing rates have sustained for 10 months (figure 3)
- ADHD symptoms did not worsen during intervention phase confirmed by a separate analysis

## results

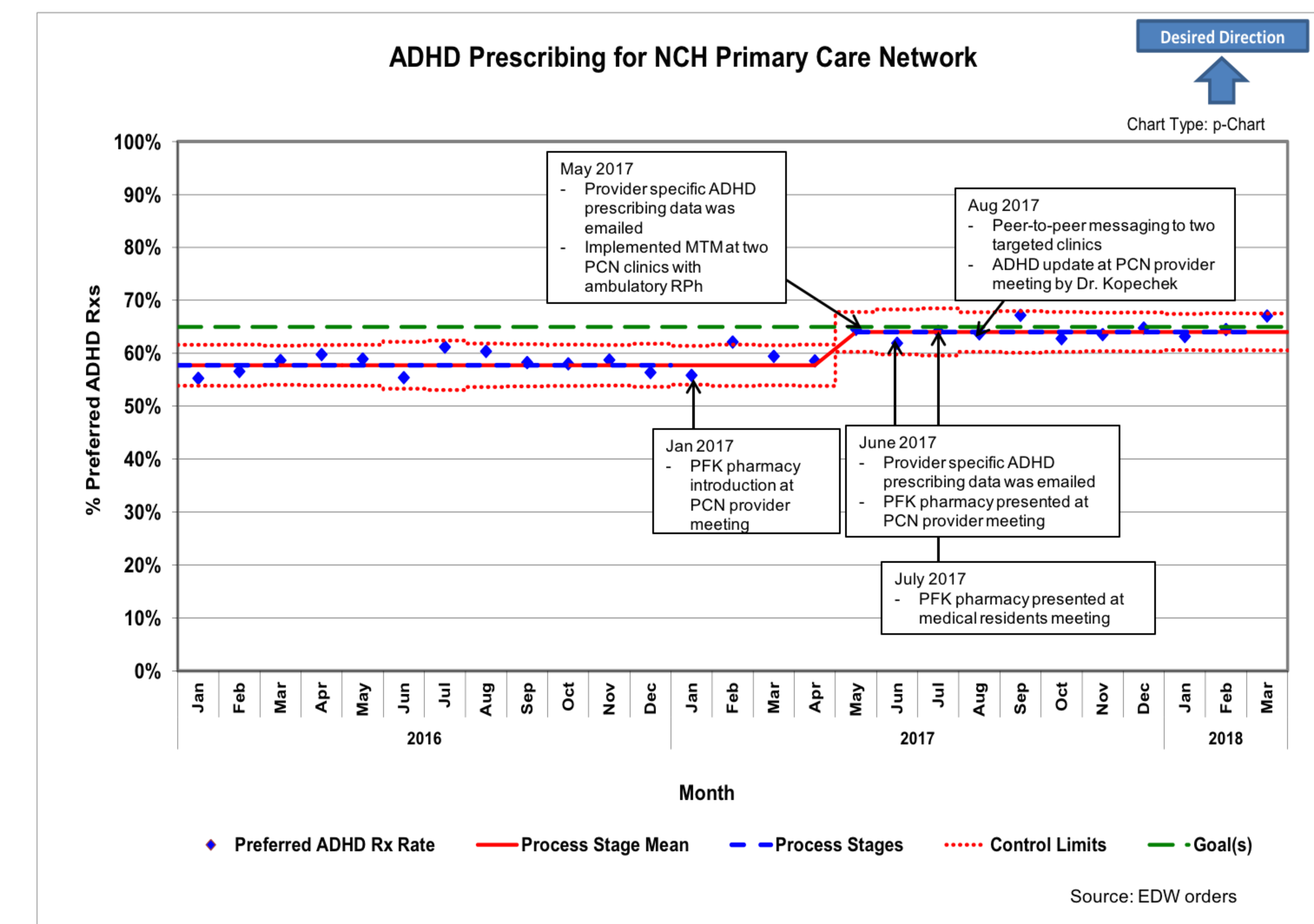


Figure 3. Primary Care Network ADHD Prescribing

## discussion

- A multidisciplinary team led QI interventions resulted in improved prescribing rates of preferred ADHD medications without decreasing the quality of care
- Target set by team was not met, but significant improvements were still demonstrated
- Major limitation: no further interventions were pursued after August because of anticipated formulary changes that would significantly impact the prescribing guidelines
- Other limitations: provider reluctance to change medication for patients controlled on current therapy, use of less familiar medication
- Future opportunities: measure financial impact, utilize technology tools to implement electronic health record alerts

## disclosure

- The authors have no conflicts of interest to disclose

## references

- State Profiles - Diagnosis and Medication Treatment Among Children Ages 4-17 Years (Survey Data). (2016). Retrieved February 17, 2018, from [https://www.cdc.gov/ncbddd/adhd/stateprofiles/stateprofile\\_ohio.pdf](https://www.cdc.gov/ncbddd/adhd/stateprofiles/stateprofile_ohio.pdf)