



End-Stage Renal Disease
Network of the Ohio River Valley

2021 Annual Report



Marblehead Lighthouse, Lake Erie - Ohio

This report will cover quality improvement efforts led by the ESRD Network from January 1, 2021 – May 31, 2021 and the Base Year of Task Order Number 75FCMC21F0004, June 1, 2021 – April 30, 2022.

July 2022
Prepared by:
IPRO ESRD Network of the Ohio River Valley
<http://esrd.ipro.org>

Submitted to:
U.S. Department of Health and Human Services (HHS)
Centers for Medicare & Medicaid Services (CMS)
for Contract Number 75FCMC19D0029

Table of Contents

ESRD DEMOGRAPHIC DATA	4
ESRD NETWORK GRIEVANCE AND ACCESS TO CARE DATA	12
ESRD QUALITY IMPROVEMENT ACTIVITIES.....	16
Transplant Waitlist Quality Improvement Activity through May 2021	16
Transplant Waitlist & Transplanted Quality Improvement Activity June-April 2022	18
Home Therapy Quality Improvement Activity through May 2021	22
Home Therapy Quality Improvement Activity June-April 2022	24
Influenza June-April 2022.....	27
COVID-19 Vaccinations Patients and Staff June -April 2022	29
Data Quality (Admissions, CMS Form 2728, CMS Form 2746) June-April 2022	33
Hospitalization (Inpatient Admissions, ED Visits, Readmissions and COVID-19 Admissions) June -April 2022.....	39
Depression June-April 2022	43
Nursing Home June-April 2022	44
Telemedicine June -April 2022	47
Vaccinations Pneumococcal-23 and Staff Influenza June-April 2022	49
ESRD NETWORK RECOMMENDATIONS	52
Facilities that Consistently Failed to Cooperate with Network Goals	52
Recommendations for Sanctions	52
Recommendations to CMS for Additional Services or Facilities	52
ESRD NETWORK COVID-19 EMERGENCY PREPAREDNESS INTERVENTION	54
ESRD NETWORK SIGNIFICANT EMERGENCY PREPAREDNESS INTERVENTION.....	55
ACRONYM LIST APPENDIX	56



ESRD DEMOGRAPHIC DATA

IPro ESRD Network of the Ohio River Valley (Network 9) is one of four End Stage Renal Disease (ESRD) Networks managed by IPro, a non-profit organization that works with government agencies, providers, and consumers to implement innovative programs that improve healthcare. In addition to serving as the ESRD contractor for the Network 9 service area, IPro manages the ESRD Network of New England (Network 1), ESRD Network of New York (Network 2), and ESRD Network of the South Atlantic (Network 6), collectively known as the IPro ESRD Network Program. IPro is fully committed to the goals and vision of the ESRD Network Program and supports the renal community in ensuring safe, effective, patient-centered care for the more than 194,000 ESRD patients in the four Network areas it manages.

The Network serves ESRD patients, dialysis providers, and transplant centers in the states of Kentucky, Indiana, and Ohio. The role of the Network is to improve the quality of care for people who require dialysis and/or kidney transplantation. The Network aligns its mission and activities with the National Quality Strategy's three broad aims and the Centers for Medicare & Medicaid Services' (CMS') priorities for the ESRD Network Program. Its goals, our methodology for attaining them, and our achievements are described throughout this report.

According to ESRD National Coordinating Center (NCC) 2021 end-of-year data, the ESRD population in the Network was 50,700, the fifth largest in the country.

The largest population of ESRD patients in the Network's service area reside in Ohio, which has approximately three times the patient population of Kentucky, the region's smallest state. In 2021, nine new Medicare-certified dialysis facilities opened in the Network's service area, increasing the number of facilities to 660. Also included in the Network's service area are five Veterans Affairs (VA) hospitals and 14 transplant centers. In 2021 the Network service area ranked fifth among all Networks in patient census, yet it had the third largest number of ESRD facilities in the nation. As of December 31, 2021, the Network service area included 50,700 patients; 33,698 of whom were prevalent dialysis patients and 18,002 were patients who had received a transplant.

An ongoing characteristic of the Network service area has been its large number of facilities, which results in the region having a lower average patient census per facility than most other ESRD Networks. This provided the patients in the region with more options for selecting a facility, dialysis provider, treatment modality, schedule, and medical care.

Conversely, the Network observed that the large number of facilities can lead to staff shortages, leadership transition issues, and need for frequent retraining of staff due to continual turnover and recruitment for new facilities. These issues created challenges for Network staff in establishing continuity of care and sustaining practices for optimal outcomes.

The Advancing American Kidney Health Initiative signed into legislation in July 2019 focuses on increasing ESRD patients' access to transplant and home dialysis, based on the scientifically proven improvement in quality of life, mortality, and morbidity for ESRD patients using these

modes of renal replacement therapy, as opposed to in-center hemodialysis (ICHD). ESRD Networks are charged with increasing the number of ESRD patients offered and receiving these renal replacement modalities. The Network observed interesting shifts in data that have aligned with the goals of this initiative since 2016.

Data from 2021 indicate, for a second consecutive year, a reduction in the number of patients dialyzing in-center from 28,107 in 2020 to 26,995 in 2021. The growth in prevalent patient census continued to occur exclusively within the treatment modalities of home and transplant.

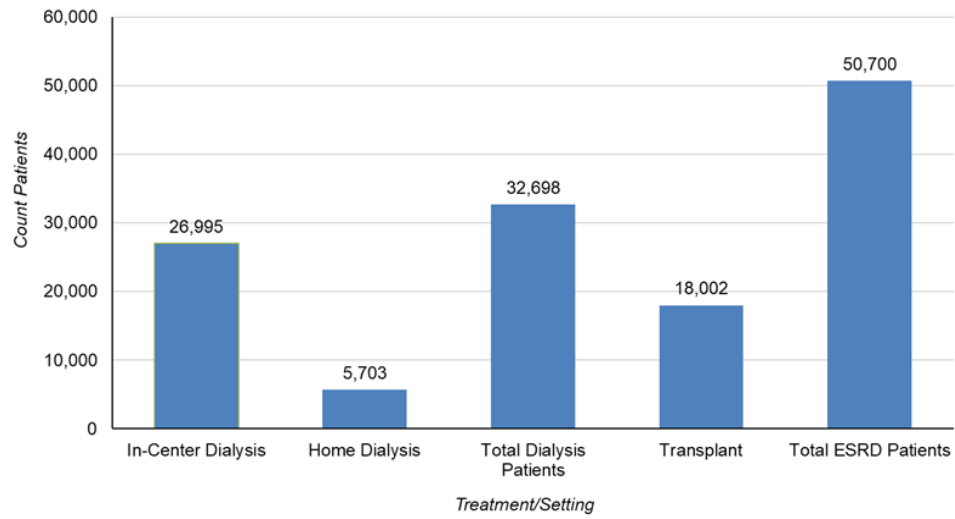
In addition, 11% of all ESRD patients in the Network dialyze on a home therapy and 36% are transplanted. This has resulted in a reduction of the overall ESRD population on ICHD to 53% of the ESRD population in 2021, a 3% reduction from 2020, and an increase from 44% to 47% of prevalent patients in the Network's service area dialyzing using the preferred modalities.

In 2021 the Network continued its efforts to promote increased use of these modalities as preferred choices in renal replacement therapy and to decrease ICHD as the primary option for care. While the growth in use of home modalities has shown a moderate increase of 2.0% over the past five years, transplant has shown a 6% increase, accounting for a shift in the number of ESRD ICHD patients from 61% of the population in 2018 to 53% in 2021. Graphs illustrating the overall demographic data for the Network are found on the following pages.

The Network worked with community coalitions, a subgroup of dialysis facilities within its service area that included both high- and low- performing facilities. These facilities completed root cause analyses (RCA) and participated in a Plan-Do-Study-Act (PDSA) cycle of four months. During the PDSA cycle, the Network engaged the community coalition facilities in interventions to drive improvement at the Network and facility level and assisted with mitigating barriers by providing 1:1 technical assistance based on data and facility specific needs. Upon completion of the PDSA cycle, best practices identified within the coalitions were spread to facilities across the Network's service area to form a community of practice.

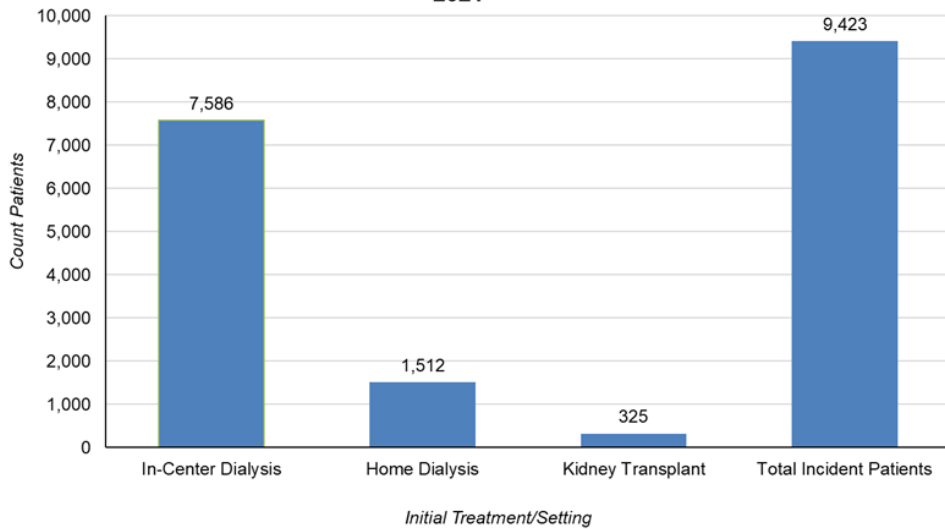
In 2021, the Network deployed interventions and strategies that targeted patients, dialysis and transplant providers, and other stakeholders. These interventions, which focused on preventing the transmission of COVID-19, supporting patients and providers through the public health emergency, engaging patients, and improving quality of care for ESRD patients are detailed in this report.

**Network 9: Count of Prevalent ESRD Patients by Treatment/Setting
2021**



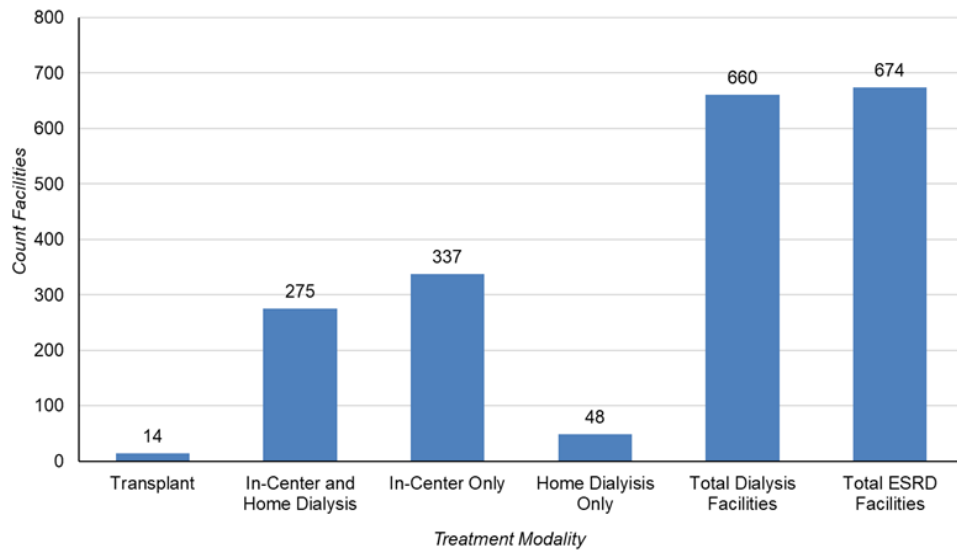
Total Dialysis Patients = In-Center Dialysis + Home Dialysis
 Total ESRD Patients = Transplant + Total Dialysis
 SNF dialysis patients are not shown due to small numbers.
 Source of data: EQRS May 2022

**Network 9: Count of Incident ESRD Patients by
Initial Treatment/Setting
2021**



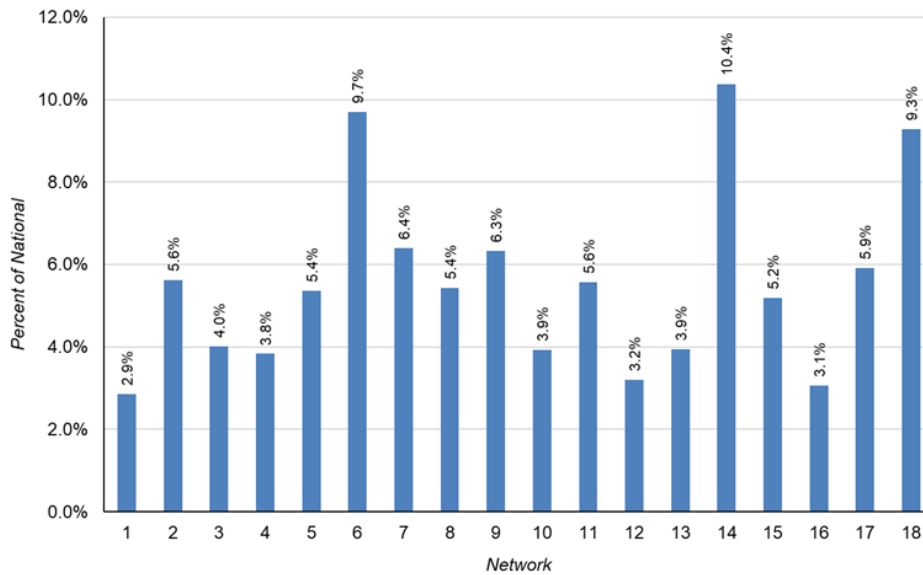
Total Incident Patients = In-Center + Home + Kidney Transplant
 Source of data: EQRS May 2022

**Network 9: Count of Medicare-Certified Facilities
by Treatment/Setting
2021**

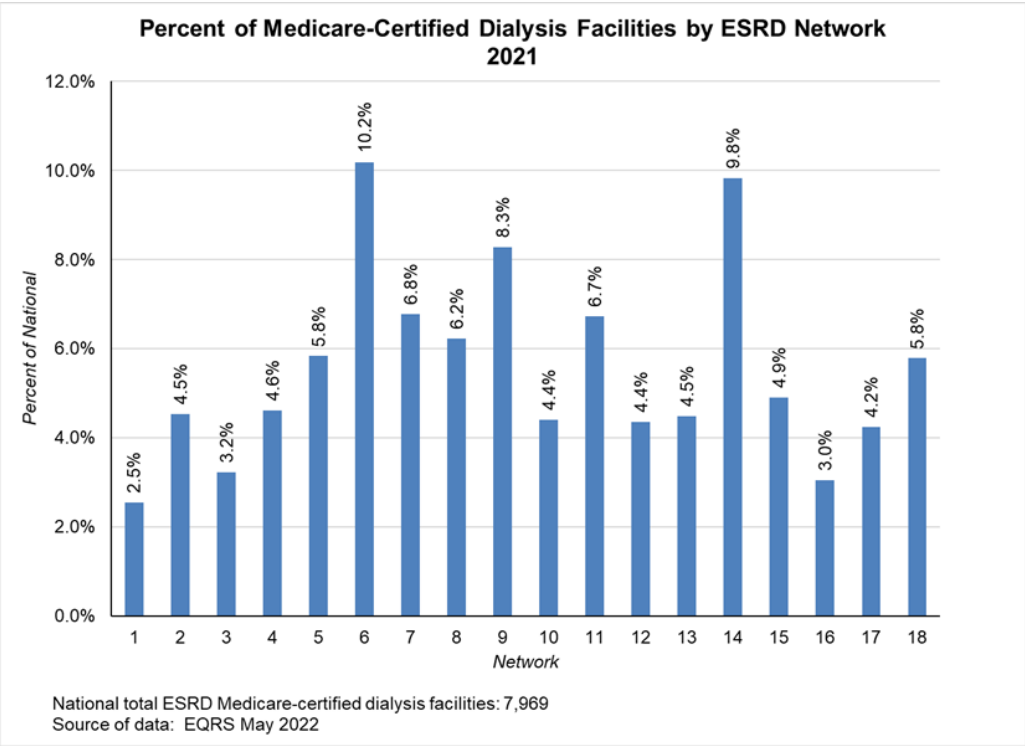
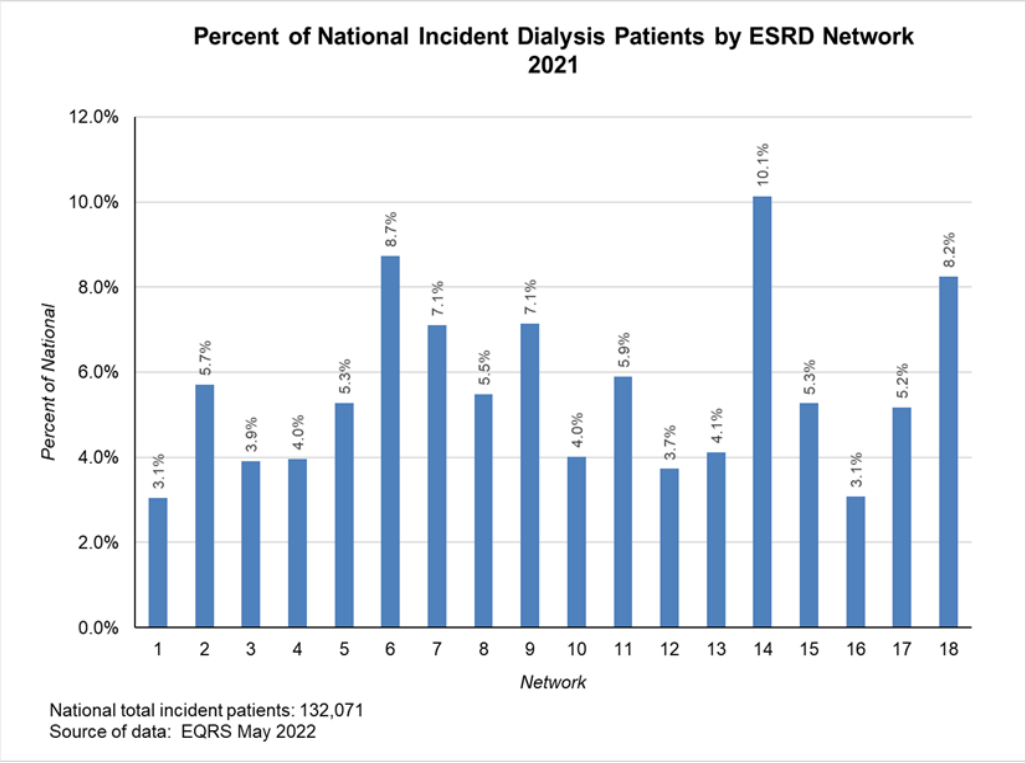


Total Dialysis Facilities = In-Center and Home Dialysis + Home Dialysis Only + In-Center Only
 Total ESRD Facilities = Transplant + Total Dialysis Facilities
 Source of data: EQRS May 2022

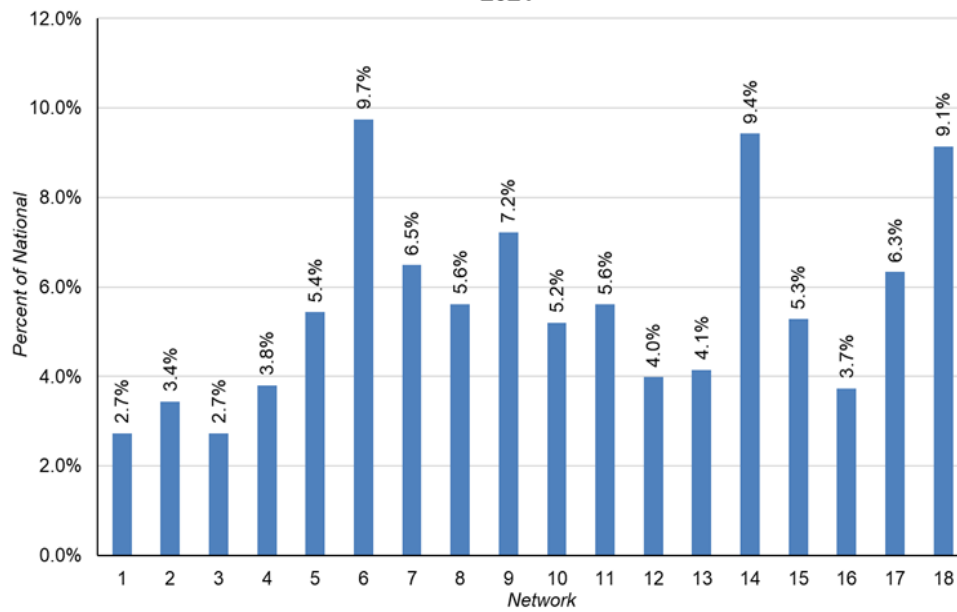
**Percent of National Prevalent Dialysis Patients by ESRD Network
2021**



National total dialysis patients: 516,929
 Source of data: EQRS May 2022

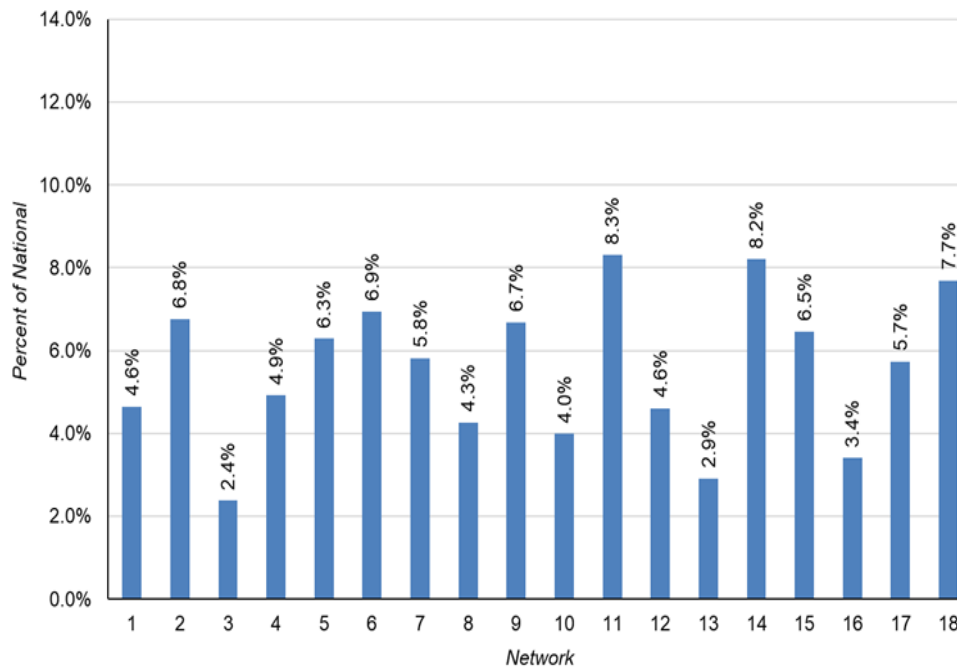


Percent of National Home Hemodialysis and Peritoneal Dialysis Patients by ESRD Network 2021



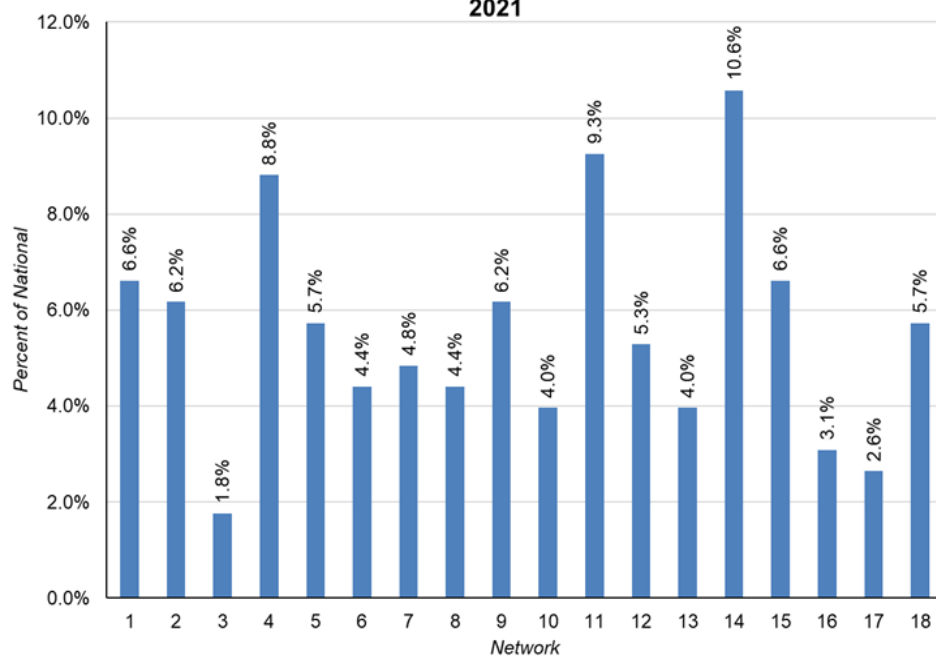
National total home hemodialysis and peritoneal dialysis patients: 79,071
Source of data: EQRS May 2022

Percent of National Transplant Patients by ESRD Network 2021



National total transplant patients: 269,424
Source of data: EQRS May 2022

**Percent of Medicare-Certified Kidney Transplant Facilities by
ESRD Network
2021**



National total ESRD Medicare-certified kidney transplant facilities: 227
Source of data: EQRS May 2022



ESRD NETWORK GRIEVANCE AND ACCESS TO CARE DATA

IPRO ESRD Network of the Ohio River Valley responds to grievances filed by or on behalf of ESRD patients in Indiana, Kentucky, and Ohio, with a goal to address and mitigate concerns.

Grievances

During the reporting period, the Network received a total of 57 grievances. 24 of the cases were identified as immediate advocacy. Of those 24 cases, nine (37%) were revised to a general grievance case and required extensive efforts by the Network to resolve. In addition to the nine revised general grievances, 28 cases were initiated as general grievances yielding a total of 37 general grievance cases. The least reported type of case was clinical quality of care, totaling five cases. For all five cases, the Network's Quality Improvement Director provided clinical expertise, reviewed patient charts, and participated in care conferences if applicable. The most reported area of concern within these grievances were treatment related and quality of care, representing 45% of all the reported grievances. Other concerns included staff related concerns, physical environment (building issues, water room), and clinical quality of care requiring review from the Network nurse.

The Network received 245 facility concerns. These consisted of calls from facility staff to discuss patient concerns related to behavior, treatment, and mental health. Of those cases, 106 (43%) were related to non-adherence with treatment. Disruptive and abusive behaviors were the reason behind 46 of the cases (18%), and concerns about mental health and cognitive issues were the cause of 25 (10%) cases. 32 cases (13%) fell into the "other" or "miscellaneous" category. Network interventions were implemented to support treatment adherence, de-escalation of disruptive behaviors, and referrals to mental health services, when appropriate. Several resources were created and shared to assist facilities with addressing the identified concerns.

Staff shortages within dialysis facilities significantly affected patient care during the period January 2021 – April 2022. Due to the pandemic, dialysis social workers were needed to cover multiple clinics and were often unable to devote adequate time to their assigned patients. To help address the potential issues resulting from these situations, the Network encouraged staff to outline patients' strengths and utilize them to address the challenging behaviors. These approaches focused on reducing staff burnout and compassion-fatigue.

Access to Care and Involuntary Discharge (IVD) Cases

During the reporting period, the Network received 169 cases involving access to care concerns. 27 of the cases opened in 2020 and resolved in 2021. 84 (49%) cases were at-risk with only 10% converting to an actual IVD. With each access to care case, the Network provided technical assistance (TA) to help facility staff effectively support and protect their patients' access to treatment while ensuring they were following the CMS policy and procedure.

When a patient was involuntarily discharged, facility staff were strongly encouraged to strategize long-term solutions and action plans to obtain placement for the patient. The

Network continued to promote a *Second Chance Program* to clinics for patients with a history of behavioral and non-adherence issues, with a goal to reduce the number of failure to place patients using hospital emergency departments for life-sustaining treatment. The Network provided educational resources to both patients and clinic staff on patients' rights and the CMS Conditions for Coverage. The Network encouraged clinic staff to integrate patients into their Quality Assurance Performance Improvement (QAPI) meetings.

Network Assistance and Quality Improvement

The Network worked with facilities toward a goal of averting a discharge and striving to ensure that the patient continues to receive treatment at the facility. Mediation was provided to assist patients and facilities with determining the most effective route for treatment-- whether it was transferring the patient to an alternate facility or having the patient receive treatment emergently through the hospital emergency department.

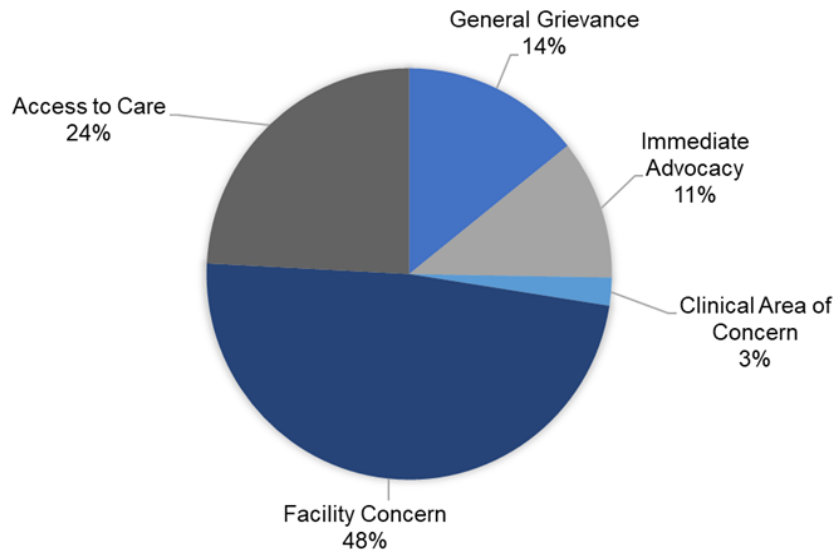
- Conducted quality improvement activities (QIAs) to increase patient awareness of the Network and the educational resources available,
- Increased use of IPRO Learn modules,
- Provided support to dialysis staff who have limited time, skills and training in conflict resolution, with an ultimate goal to enhance staff members' ability to manage and deal with patients who have mental, emotional and/or psychosocial issues.

The Network continuously promoted an environment of advocacy for all ESRD patients and ESRD caregivers. Through its advocacy work, the Network educated all participating parties on patient rights; provided mediation to help de-escalate ongoing patient concerns and create an environment of safety and inclusion; developed interventions to provide facility staff members with de-escalation skills, effective communication skills, and ways in which they could identify potential healthcare barriers to better support their patients. The interventions provided facilities with the necessary guidance to improve their patients' overall quality of care.

The Network provided patients and facilities with the following resources:

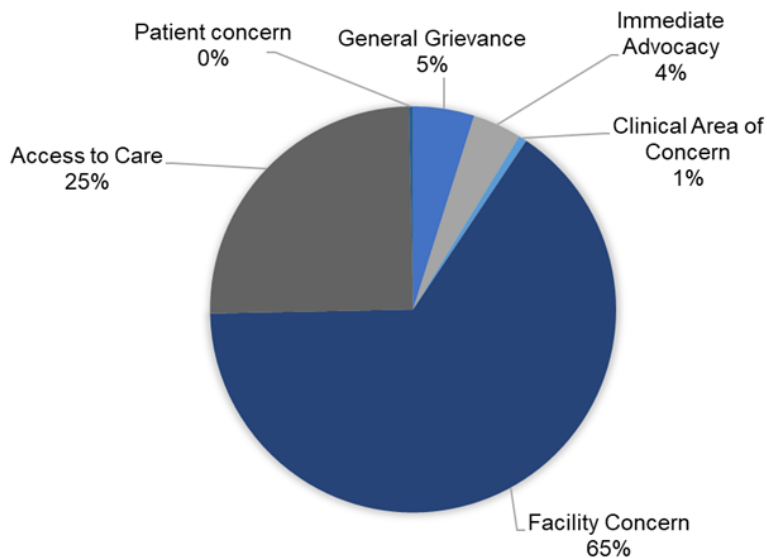
- *Preventing the Involuntary Discharge of Dialysis Patients Facility Guide and Checklist*,
- A poster and flyer (*What the Network Staff Can and Cannot Do*) that outline for patients clearly defined parameters of the support that the Network is able to provide, as well as a list of the types of support that the Network is not able to provide,
- Crisis Prevention Institute (CPI's) *Top 10 De-Escalation Tips* resource provides strategies to help clinic staff take a constructive, positive, and empathic approach to their dealings with patients,
- *Decreasing Patient Conflict: Pathway to Resolution* handout and algorithm.

Network 9: Percent of Jan-May 2021 Grievances and Non-Grievances by Case Type



Source of data: Patient Contact Utility (PCU) accessed April 2022

Network 9: Percent of Jun 2021-Apr 2022 Grievances and Non-Grievances by Case Type



Source of data: Patient Contact Utility (PCU) accessed May 2022



ESRD QUALITY IMPROVEMENT ACTIVITIES

Transplant Waitlist Quality Improvement Activity through May 2021

Due to the COVID-19 pandemic limiting provider staffing and procedures, along with contract goal adjustments, the Network worked toward the goals of this quality improvement activity but was not evaluated on results through May 2021. The new contract June 2021-April 2022 the Networks focused on Quality Improvement Goals.

The Network was tasked with continuing to provide educational materials to patients and dialysis facility staff to maintain communication in an effort to increase the number of patients on the transplant waiting list during the COVID-19 pandemic. The pandemic caused reductions in provider staff and in the number of transplant procedures conducted nationwide.

Project Overview

Transplant centers in the Network were heavily impacted by the pandemic, as many furloughed their non-clinical employees and focused solely on deceased donor transplants. Transplant centers ceased to process new referrals and to conduct patient evaluations for waitlisting. The routine procedures that are necessary to evaluate a patient for the waitlist were, in many instances, not available to be scheduled since most of these were considered elective and not supported by hospitals during the pandemic. The Network's primary focus during the peak of the public health emergency in 2021 was to ensure that patients already waitlisted were able to maintain their active status and that existing transplant patients had access to necessary medications, as well as enhanced safety protocols, due to their immunocompromised status.

Interventions

The Network provided individual technical assistance to overcome issues with courier and lab availability that jeopardized processing of the required annual blood samples for waitlisted patients. To assist transplant patients the Network intervened to ensure ongoing access to necessary post-transplant medications in the face of pandemic shortages. The Network provided these patients with information on alternate pharmacy options and generic versus brand name product choices via mailings and the *Provider Insider* and *Patient Speaks* publications. Network staff also focused on developing educational materials to ensure that transplant patients are aware of their increased risk of infection, serious illness and death due to their immunocompromised status; and, to help them take precautionary steps to protect their health. This was done by sharing posters for patients to place at the entrance of their homes to advise visitors that a high-risk person lived there and sharing guides on how to keep safe in a multi-generational household. Best practices such as the use of telemedicine for office visits, limiting travel, and limiting social exposure were provided as educational topics for this at-risk group via webinars and QIA specific mailings.

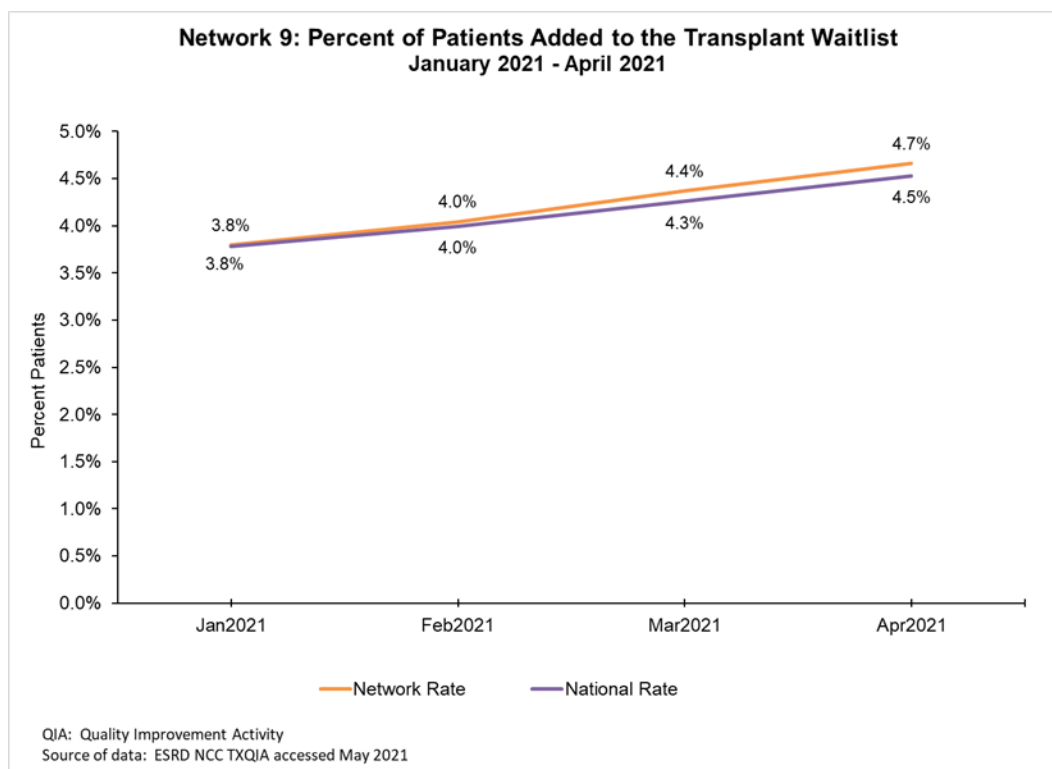
Barriers to achieving goals

Inconsistent communication to transplant recipients was a major barrier during this time period. Due to the limited availability of staff, many patients were unable to maintain ongoing communication with their transplant centers. Due to the evolving nature of many of the

pandemic challenges, such as medication shortages, it was difficult to keep recommendations current. COVID-19 vaccination hesitancy also proved to be a barrier, as vaccination was required to maintain an active status on the waitlist.

Best practices spread to achieve goals

Working closely with transplant centers throughout this time period was essential in solving many of these challenges. The Network encouraged information sharing among the different transplant programs. When able, transplant centers posted information for patients to their website or in COVID-19 information releases. A best practice instituted at transplant centers was to maintain active check-in calls with their current waitlisted patients to provide updates and mitigate barriers.



Transplant Waitlist & Transplanted Quality Improvement Activity June-April 2022

Project Overview

The Executive Order signed on July 10, 2019, titled Advancing American Kidney Health Initiative challenged the ESRD community to increase access to transplant through improved coordination between transplant centers and dialysis facilities, as well as through increased access to organ offers and use of living donation. The goals of the order include increasing the number of kidneys available for transplant by 2025 and ensuring that 80% of all new dialysis patients are either placed on a home modality or receive a transplant, rather than receive ICHD. The IPRO ESRD Network of the Ohio River Valley was already focused on creating a culture in the community that embraced the bold goals of the Executive Order to further our work.

The Network encouraged selected community coalition facilities to conduct Plan-Do-Study-Act (PDSA) for all implemented interventions, including those promoted by the ESRD National Coordinating Center (NCC) Transplant Learning & Action Network (LAN). The Network incorporated human centered design (HCD) practices in the development of patient-centered activities, support of Quality Assessment Performance Improvement (QAPI) plans, and the creation of a foundational premise for support groups and patient plans of care.

The Network facilitated participation and collaboration across all healthcare entities to create a culture of support and knowledge about transplantation. Patient Facility Representatives (PFRs), Patient Advisory Committee (PAC) members, and Patient Subject Matter Experts (PSMEs) were recruited to collaborate with the Network on the development of educational content and resource material. Additionally, patient feedback was requested to determine the effectiveness of implemented interventions.

The Network activities resulted in 1,532 patients being added to the transplant waitlist as of April 30, 2022, surpassing the 2% goal with a 4% increase over baseline. Though the Network work resulted in 1,186 patients receiving transplants, the Network did not achieve the 2% goal.

Interventions

To create a one-stop location for facility staff to complete quality improvement activities; participate in on-line discussions; post questions for project leads; and have 24/7 access to continuing education programs, educational videos, webinars and QIA resources and tools, the Network launched **IPRO Learn**, an electronic learning management platform built on open-source software.

Each month, via **IPRO Learn**, facilities were assigned activities that aligned with coalition PDSA cycles to support individual facility efforts toward increasing the number of their patients on the transplant waitlist and the number of patients receiving transplants. The Network worked diligently to promote use of **IPRO Learn** since its launch in September 2021, and as of the end of the reporting period, more than 80% of the facilities in the Network's service area were using the platform on a consistent, monthly basis.

The Ohio River Valley Transplant (ORVTx) Coalition continued to work as a community of practice and committed to work collaboratively on improving communication between transplant centers and dialysis facilities, share best practices broadly, and improve education on living donation and patient organ choice. The efforts of the ORVTx align with the quality improvement work of the Network, and education and resources developed by the coalition, such as the *Wait Less* tool, have continued to be used to bolster the Network's efforts.

To address health inequities in the ESRD population the Network implemented a discussion forum for facility staff. The forum provided a space in which facilities could share their barriers and best practices related to patients having access to transportation to and from pre- and post-transplant appointments and served to foster a community of practice amongst facilities. Issues related to health literacy were addressed by the Network through the Health Literacy Toolkit module presented on **IPro Learn**, which taught the fundamentals of health literacy, how to assess a patient for low literacy, and how to communicate effectively with patients once their literacy levels are known.

Barriers to achieving goals

The pandemic resurgence was exceptionally strong across the Network service area, nearly halting all QIA progress. The resulting increase in staff shortages and turnover of staff in dialysis and transplant facilities negatively affected Network strategies to increase rates of waitlisting and transplant. High rates of staff turnover resulted in the hiring of facility staff members who were not familiar with the work of the Network; lacked the knowledge and awareness of the importance of presenting transplant as a treatment option; lacked the knowledge of social work relative to dialysis patients gained only through experience; were not knowledgeable about CMS goals and initiatives, and lacked knowledge of best treatment choices, such as transplantation, for the Network region's patient population.

This led to fewer patients being informed about the option of transplant prior to starting dialysis, lack of consistency in communication of the waitlist guidelines; and exacerbation of the effects of social determinants of health in hindering patients' interest in and access to transplant.

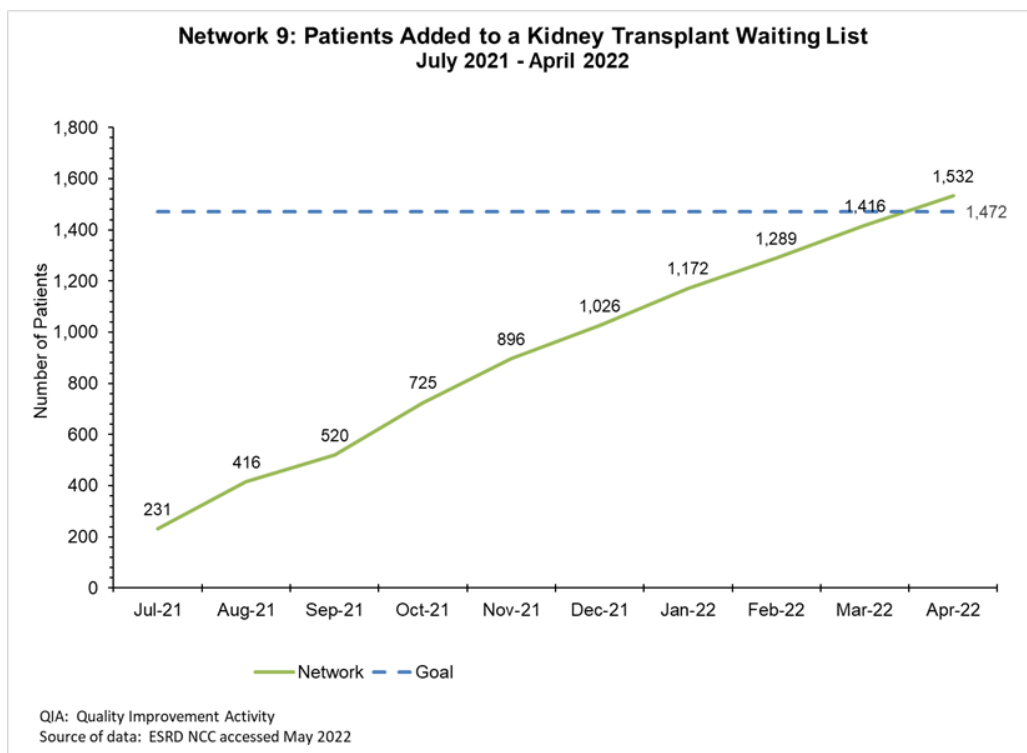
A patient's eligibility for transplant varies depending on the transplant center, the patient's health status, the physician's perception of the patient's eligibility for transplant, and the patient's financial status. The evaluation process for transplant was further hindered by numerous barriers and process changes that required improved communication among the dialysis facilities, transplant centers, and patients.

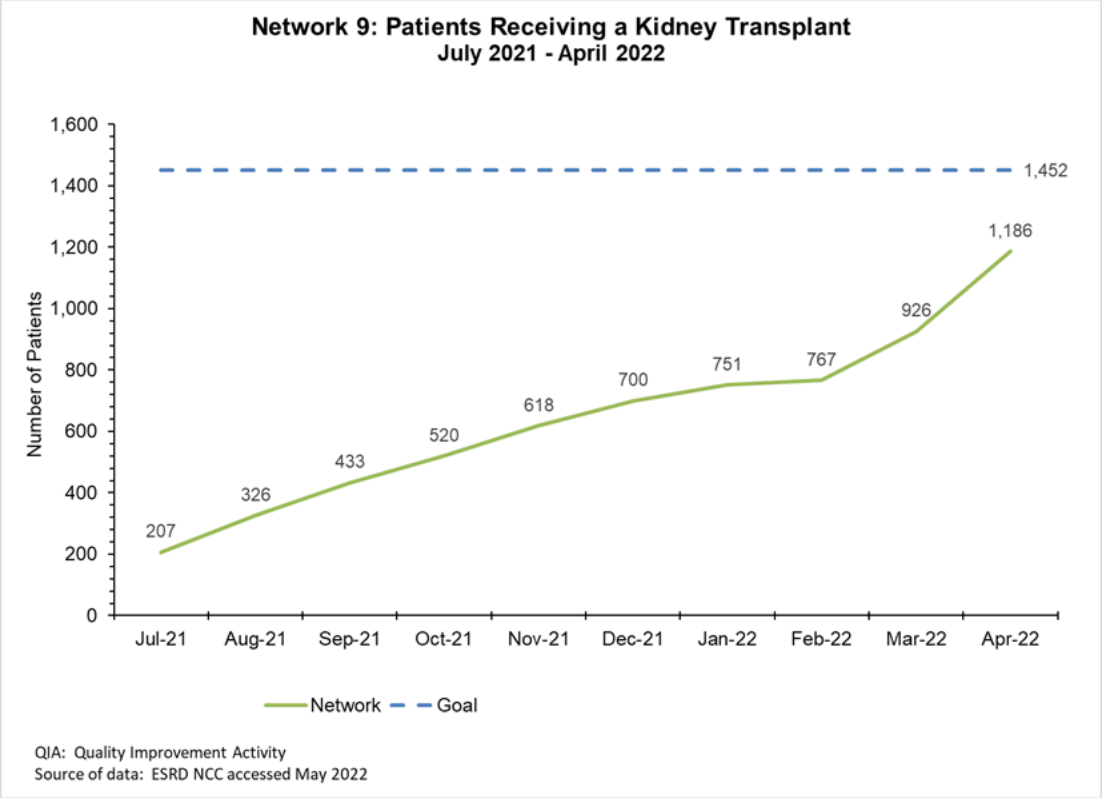
Best practices spread to achieve goals

Despite the setbacks this past year, the Network's efforts resulted in the addition of 1,532 patients to the transplant waitlist; and 1,186 patients in the Network's service area received a kidney transplant. This success was due, in part, to the Network team's continued collaboration with transplant centers to help streamline referrals, the use of telemedicine and Network resources to complete the work-up process, and the implementation of workflows to keep

patients on the waitlist. These best practices were shared quarterly with all facilities in the Network's service area via a live webinar, and they are featured on the **IPro Learn** platform. During one webinar a guest speaker from a Network transplant center shared a strategy that includes defined steps to help patients prepare for the transplant process and areas of focus to assist the patient throughout the evaluation and waitlist phases. The guest speaker discussed methods to find a living donation once the patient is on the transplant waitlist as well as how the medical team can assist patients every step of the way.

Other noted best practices included providing education and resources to the patients, caregivers, and facility staff about the Kidney Donor Profile Index (KDPI) and Estimated Post Transplant Survival Score (EPTS) as a way to increase acceptance of organs that would otherwise be discarded; providing tools to dialysis facilities and transplant centers to educate patients in making informed choices about their treatment options; and encouraging streamlined referral processes.





Home Therapy Quality Improvement Activity through May 2021

Due to the COVID-19 pandemic limiting provider staffing and procedures, along with contract goal adjustments, the Network worked toward the goals of this quality improvement activity but was not evaluated on results through May 2021.

Project Overview

During 2019 the Network achieved more than 2,500 patients transitioning from in-center hemodialysis to a home therapy modality. During the pandemic the Network's team continued to promote the importance of referring patients to home treatment, especially in light of home modalities' decreased risk of disease transmission. Network-hosted educational and training resources emphasized the enhanced safety of this option and the value of home therapy in preventing patient exposure to COVID-19 during treatment at the dialysis facility and while traveling to and from the dialysis facility. Baseline data from 2020 indicate that even during the height of the pandemic, the Network referred 2,367 patients to a home modality.

Interventions

During the pandemic the Network published and distributed a monthly newsletter to provide dialysis staff with a reliable format to receive consolidated communications and updates as the pandemic evolved. The newsletter featured education and information on how to effectively refer to a home modality and the importance of keeping patients home to prevent disease transmission. The Network offered to all facilities an educational program on the benefits of telemedicine in conducting clinic visits and assembled a patient and provider checklist on how to optimize the use of telemedicine in conducting a monthly clinic visit. The Network worked one-on-one with facilities experiencing increased cases of COVID-19 and advocated for offering home modalities as a means to help patients minimize exposure risk. When the vaccine became available, Network staff worked to ensure that home programs in the Network service area had information to share with their patients on how to get a vaccine or that they were arranging for patients to visit the home clinic to receive the vaccine.

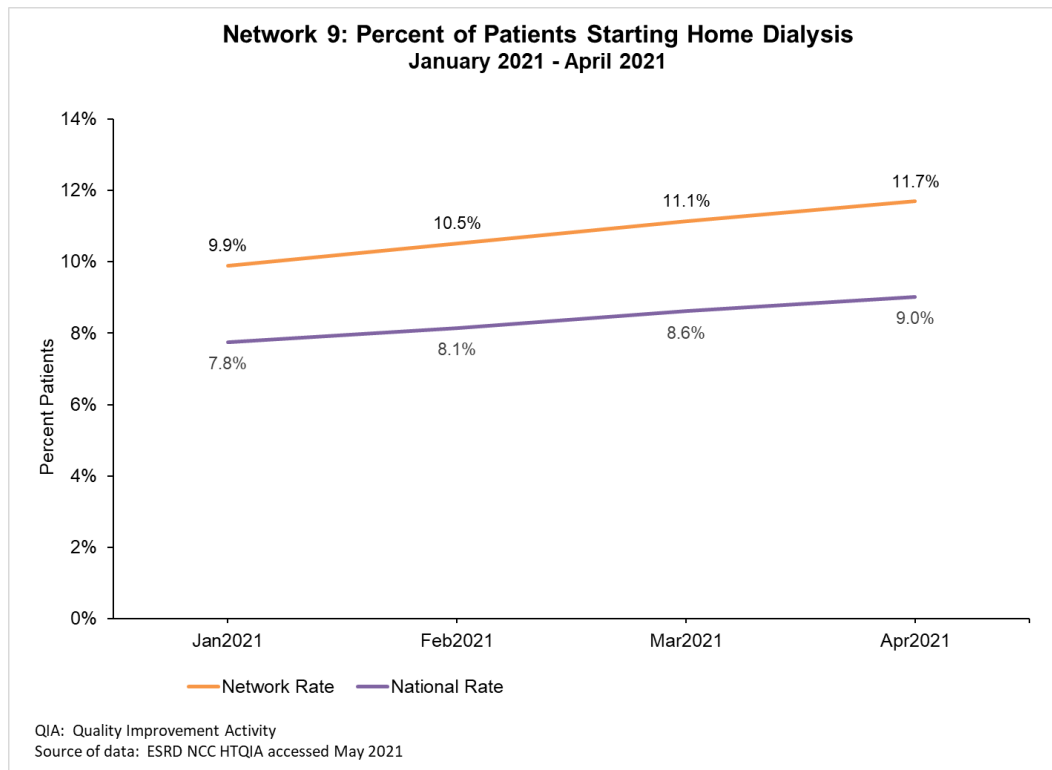
Barriers to achieving goals

The number one barrier to growing home modality use was the loss of home program staff. To help during the pandemic home staff were deployed away from their roles in the home program to provide extra staff for the COVID-19 cohort facilities or shifts that emerged. Home program staff were also utilized to bolster the ICHD staffing so that additional facilities/shifts could operate, and extra triage processes could be conducted all to prevent the spread of COVID-19 in the dialysis facility. This reduced the amount of education, training, and advocacy for home therapies within the prevalent and new patient population. Also, the available time to provide training time for patients to start a home therapy was impacted negatively—all of which resulted in a reduction in referrals to a home program and home initiations.

Best practices spread to achieve goals

During the quarterly regional best practice calls, the Network featured two home champion physicians who detailed the methods they were using to maintain home growth and outlined how to operationalize the use of telemedicine to conduct home clinic visits. The Network also

spotlighted a patient who talked about how her use of telemedicine played a critical role in protecting her from exposure to the virus.



Home Therapy Quality Improvement Activity June-April 2022

Project Overview

As of May of 2021, 7.2 % of the ESRD patients in the Network's service area were being treated on a home modality, making the Network the fourth leading region in the country in terms of patients on home modalities. This high level of home utilization is attributed to a strong "pro home" culture in the Network's service area, which promoted high rates of referral even when the region suffered some of the worst COVID-19 transmission and death rates in the nation during the COVID-19 Delta variant surge (late 2021 to early 2022).

While the Network worked diligently to continue promotion of home therapy modalities, it was not successful in meeting the goals of this quality improvement activity, which called for a 10% increase over baseline in the number of incident patients starting treatment on a home modality, and a 2% increase over baseline in the number of ICHD patients transitioning to home therapy. The Network attained 91% of both the incident and prevalent patient growth goals with 1,289 incident patient referrals to home therapy over the 11-month period June 2021 – April 2022 and 2,150 ICHD patients transitioning to home care.

Interventions

The Network's Interventions focused on advancing the existing "pro home" culture that had been successfully established in its service area. Working with CKD educators and in-center chairside staff, the Network provided resources to guide facilities in educating patients about the benefits of home therapy and encouraged them to expand their candidate selection criteria to ensure that home therapy was offered as an opportunity to all with the right support and assistance to be successful. The Network also provided patient education programs that had been proven successful in helping patients more fully consider home therapy, e.g., *Experience the Difference* introductions to home hemodialysis and the use of transitional care units, which provide new patients with intensive education sessions, many focused on the treatment modalities available to them.

Barriers to achieving goals

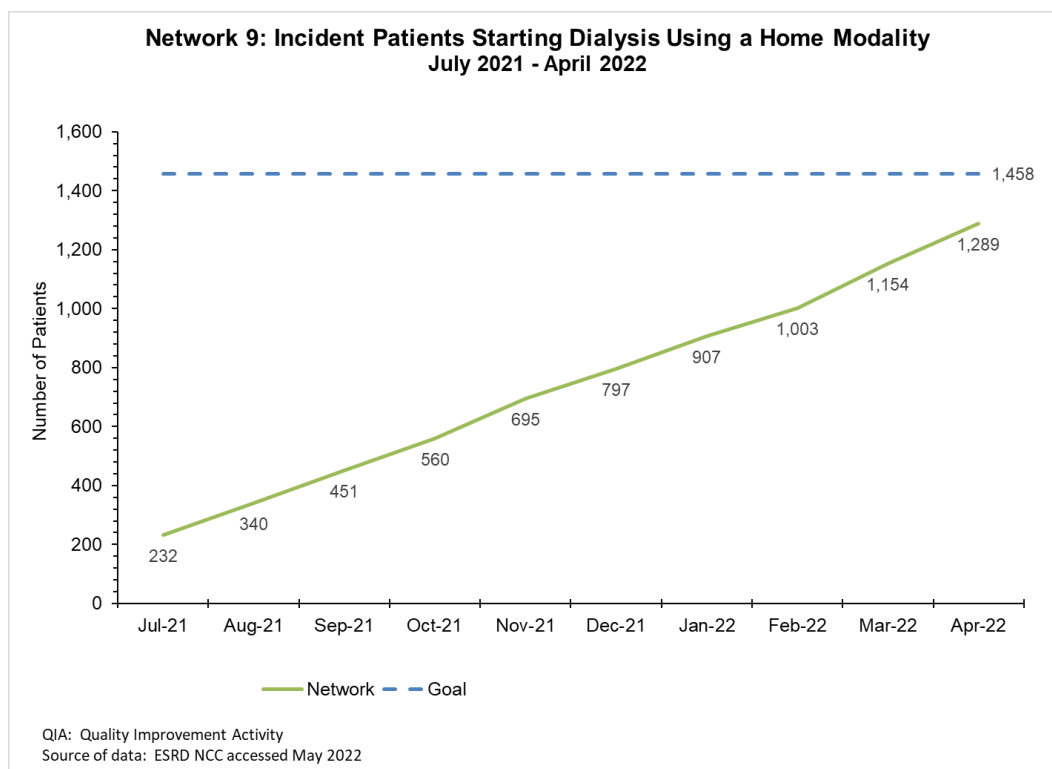
The COVID-19 Delta variant caused a significant resurgence of the pandemic in Network's service area in late 2021 and early 2022. Staff shortages of nephrology nurses and other staff members essential to providing training continued to limit efforts to rebuild and grow home programs. The inability to provide patients with education about home modalities, and the lack of home champions were also major barriers to increasing use of home modalities. The Network also noted an increasing number of patients not interested in moving to a home modality after the pandemic. Root cause analysis data show that the pandemic left patients tired and frustrated with all the changes and the volume of rules and health routines they needed to follow to stay safe, leading to a sense of being too overwhelmed to consider switching over to a home modality.

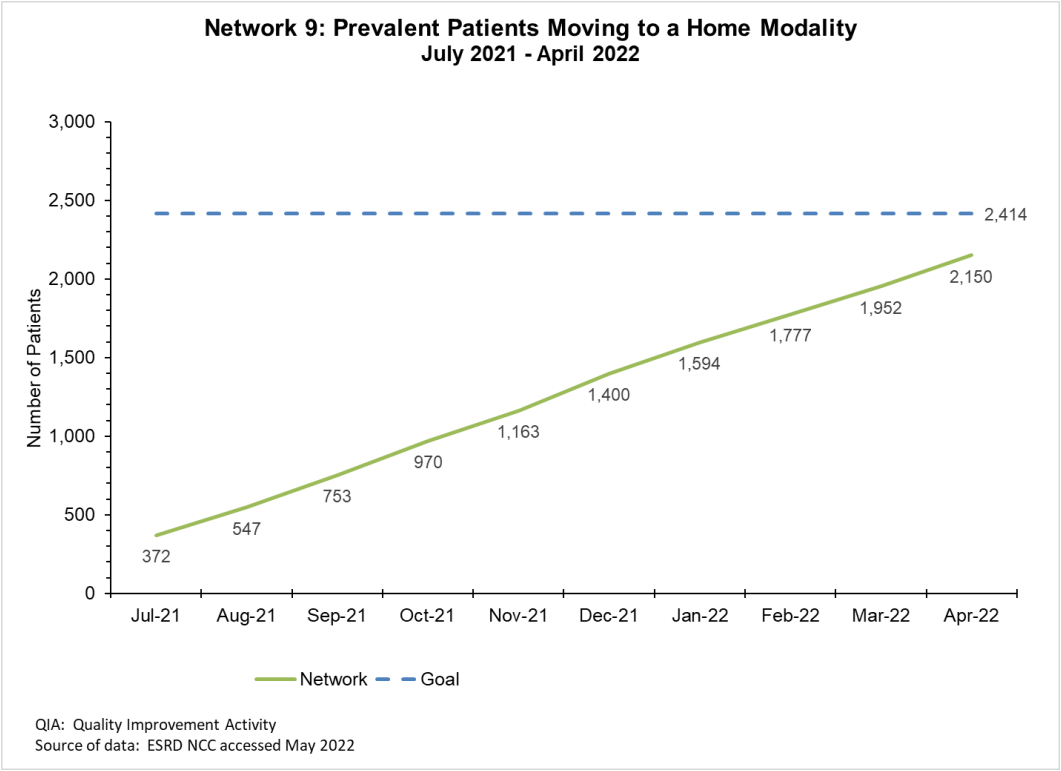
The Network's mitigation strategies focused on ways to expand home advocates beyond the traditional model of the home staff offering education and lobby days. Network staff worked to produce education on how chairside staff could advocate for a patient to consider home

therapy and to engage patient facility representatives who could continue the conversation about the benefits of home therapies.

Best practices spread to achieve goals

Working with dialysis facilities and renal care providers who continued to achieve high levels of home placement, even during the pandemic, was a key strategy in 2022. The Network featured two best practice speakers, a regional VP whose region's complete dedication and focus on home therapy placement was leading facilities within the Network's service area in placements. She spoke of her work educating every member of her team, no matter their role, on the use of home therapies and how she had adopted the use of transitional care units to further support and grow home therapy use. Another best practice speaker was a technician who worked with patients in her unit to attempt home hemodialysis in the facility using a program known as *Feel the Difference*. Her passion for home therapy was a result of her witnessing how much better patients actually felt with a home modality; she now advocates the use of a home modality for everyone with whom she works.





Influenza June-April 2022

Project Overview

The ESRD population is immunocompromised and at risk of contracting influenza and other vaccine-preventable illnesses. According to the Centers for Disease Control and Prevention (CDC), 1,000 people on dialysis die due to influenza each year. The Network worked to increase the vaccination rate for influenza to 85% of the eligible patient population during the period June 2021-April 2022. Data were reported by facilities in the End Stage Renal Disease Quality Reporting System (EQRS). Allowable exclusions were patients with medical contraindication or a history of severe allergic reaction. The Network achieved a patient vaccination rate of 78%.

Interventions

The Network worked with facilities to improve their ability to accurately document influenza vaccines in the required database, EQRS. Many facilities needed technical assistance with this process throughout the year.

As an on demand resource Network staff created a toolkit that was featured in **IPRO Learn**. The toolkit includes a variety of educational resources for providers, including the tool: *Understanding Influenza Vaccine Hesitancy and Strategies to Overcome It*.

In evaluations provided by facility staff, 85% of those completing the education indicated that they would use the tool to educate their team.

The Network also sent to each facility an Influenza progress report, which provided details about patients who had either not received an influenza vaccination or were not documented. This report allowed facilities to investigate the Universal Patient Identification (UPI) of patients to determine, of the possibilities listed above, the reason for lack of document and what appropriate action to take. This allows facilities to focus on the barriers to vaccination with those patients hesitant or unsure about receiving a vaccine.

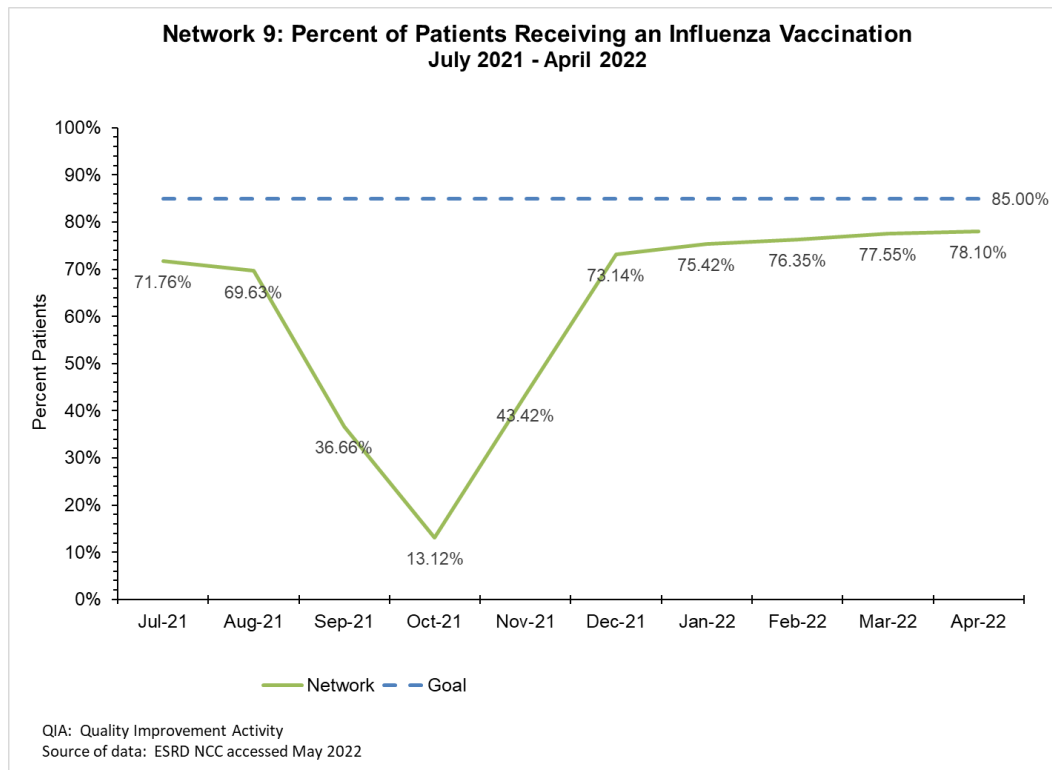
Barriers to achieving goals

The Network identified that failure to document vaccinations in the EQRS and vaccination hesitancy were the most prominent barriers to increasing the influenza vaccine rates in the Network's service area. Engagement in a new online platform complicated by frequent need for reeducation about the platform made it hard for facilities to utilize resources. Gaps in participation due to frequent staff turnover and facilities' census being lower than expected made it difficult for the Network to ensure facilities were using the tools and resources provided in **IPRO Learn**.

Best practices spread to achieve goals

Prior to flu season, the Network team worked with facilities that had low influenza rates to build a pro-vaccination culture. An emphasis was placed on providing education about the importance of patients getting the influenza vaccination, in addition to the COVID-19 vaccine, and that even with COVID-19 protocols in place both vaccines were essential to protect their

health. The Network also worked with patient advocates to dispel misconceptions about the need for the influenza vaccine.



COVID-19 Vaccinations Patients and Staff June -April 2022

Project Overview

The average age of a person on dialysis is 62 years. Due to age and compromised health status, people on dialysis and those who have received kidney transplants are at a high risk for serious illness and death related to COVID-19. People with ESRD who contract COVID-19 have a 50% likelihood of hospitalization and 20-30% chance of death.

Dialysis is a lifesaving, essential treatment that must be done three times per week for most patients. Because these services are nonelective and cannot be delayed, dialysis clinics serve patients whether or not they have COVID-19. This creates a high-risk environment for dialysis patients and healthcare personnel and further underscores the importance of vaccination to protect everyone in these clinics.

The Network worked to ensure that 80% of all patients treated in dialysis facilities were vaccinated against COVID-19. Patients with a history of severe allergic reaction to previous vaccination and those whose physicians had advised them not to receive the vaccine were considered ineligible and were excluded from the remeasurement data.

The Network's efforts resulted in an 71% COVID-19 vaccination rate among patients (April 2022, data source NHSN). The rate of COVID- 19 vaccine declination by patients was 16.3% of patients.

CMS mandated dialysis facilities to document staff COVID vaccination rates in NHSN. The documentation and reporting of staff vaccination rates has lagged behind the remeasurement date (April 2022) due to the failure of facilities and dialysis organizations to report. On April 14, 2022, a federal mandate was issued requiring that all healthcare providers that receive Medicare and Medicaid funding for services have 100% of eligible staff vaccinated. Dialysis personnel who did not have medical or religious exclusions were not eligible for employment after the effective date. As the publication date of this Annual Report, all dialysis facilities and transplant centers were required to show documentation of employees' vaccination status and proof of processes and policies in place to sustain a 100% vaccination rate of eligible employees. This documentation is now required for dialysis and transplant facilities to maintain certification and licensure.

Interventions

The Network used **IPRO Learn** to provide facility staff with on-demand educational resources, including those available in the COVID-19 toolkit, including *Coping with Infectious Disease Outbreaks in the Dialysis Setting*, which provided tips for coping and supporting staff during an outbreak and surge in their dialysis facility. **IPRO Learn** also provided facility staff a forum to share resources including CMS and CDC vaccination guidelines as they evolved.

Barriers to achieving goals

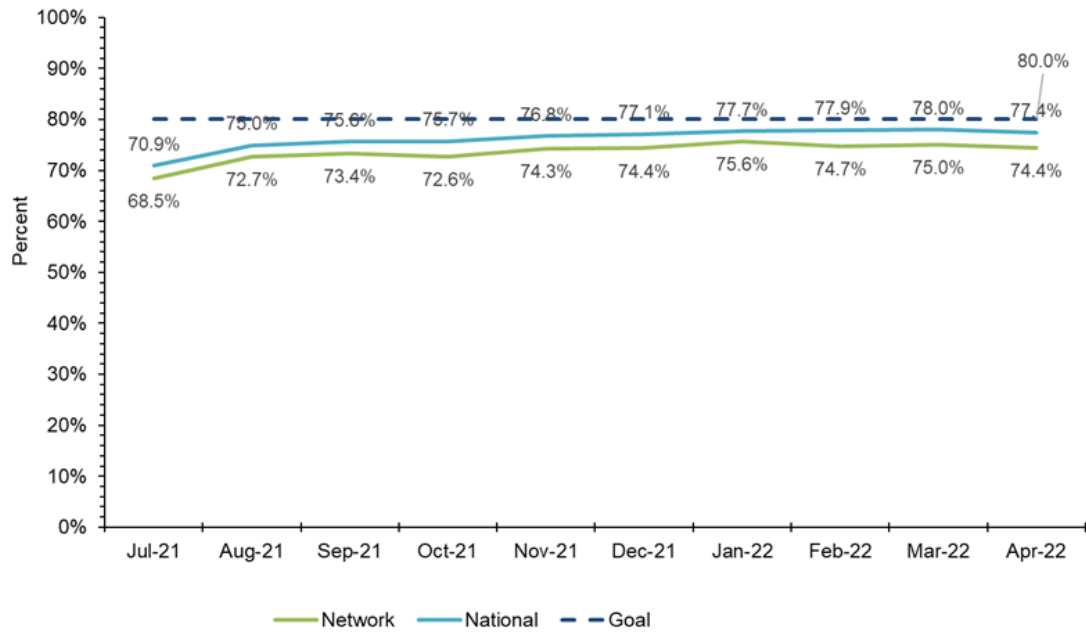
When concerns were communicated to facility staff, patient hesitancy and general mistrust in the healthcare system were two major factors that created roadblocks. Staffing shortages and high levels of turnover made it difficult for facilities to focus on achieving goals and resulted in lower than normal facility participation. Additional barriers included lack of leadership commitment to improvement initiatives and lack of communication from leadership about the importance of vaccines.

Best practices spread to achieve goals

Best practices to increase COVID-19 vaccination rates in patients and staff included:

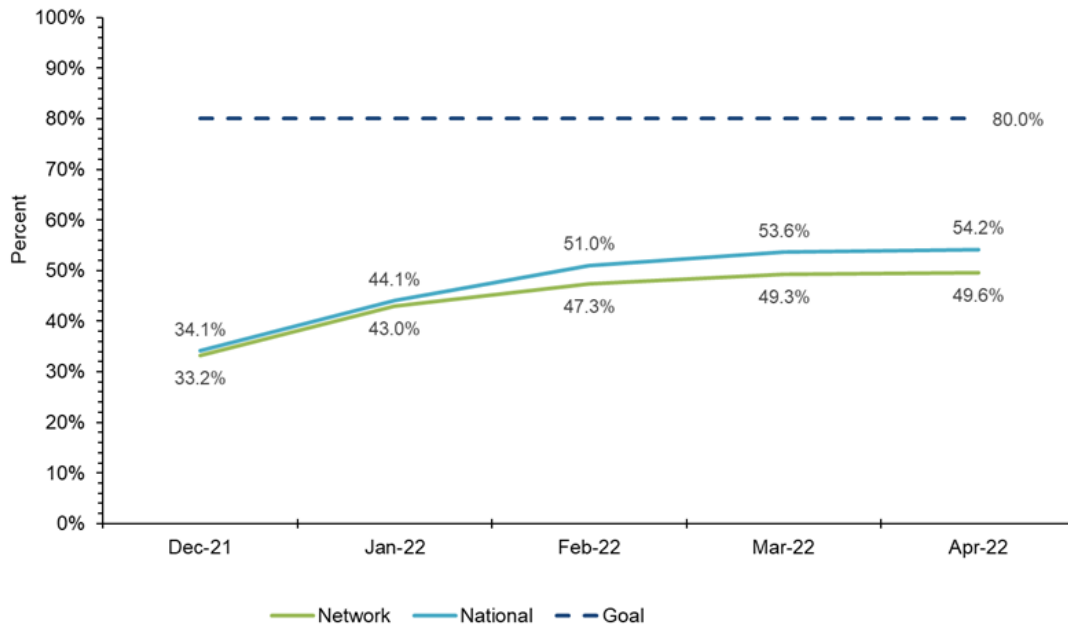
- Senior staff at facilities taking time to connect with staff and patients; some facilities did one on one coaching to increase uptake of vaccinations.
- Enlisting staff to be Pro Vaccine Champions also helped to encourage vaccinations; enlisting a Patient Facility Representative as a patient advocate was also effective.
- Medical directors that led the vaccine initiative were essential in the process.
- Addressing community-specific concerns and misinformation, such as vaccine side effects or risk helped facilitate better communication.
- Communicating to staff their high risk of exposure to COVID-19 and the importance of the vaccine to protect their family, friends, and their fellow co-workers from the virus.
- Promoting the instructional video: *Grief Management for the Caregiver During the Pandemic* to facility staff helped to relieve the stress related to the pandemic and loss of ESRD patients and staff, and proved to be effective in promoting the benefits of vaccines during the height of the pandemic.

Network 9: COVID Vaccination Rate (Dialysis Patients)
July 2021 - April 2022



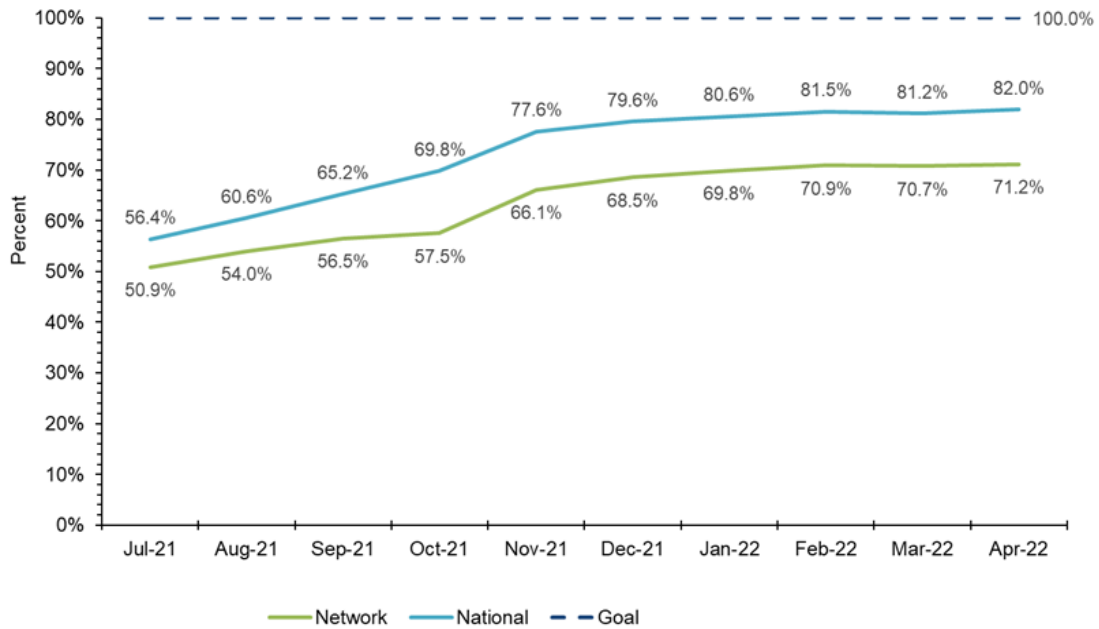
QIA: Quality Improvement Activity
Source of data: ESRD NCC accessed April 2022

Network 9: Percent of Fully Vaccinated Dialysis Patients Receiving COVID Vaccination Booster
December 2021 - April 2022



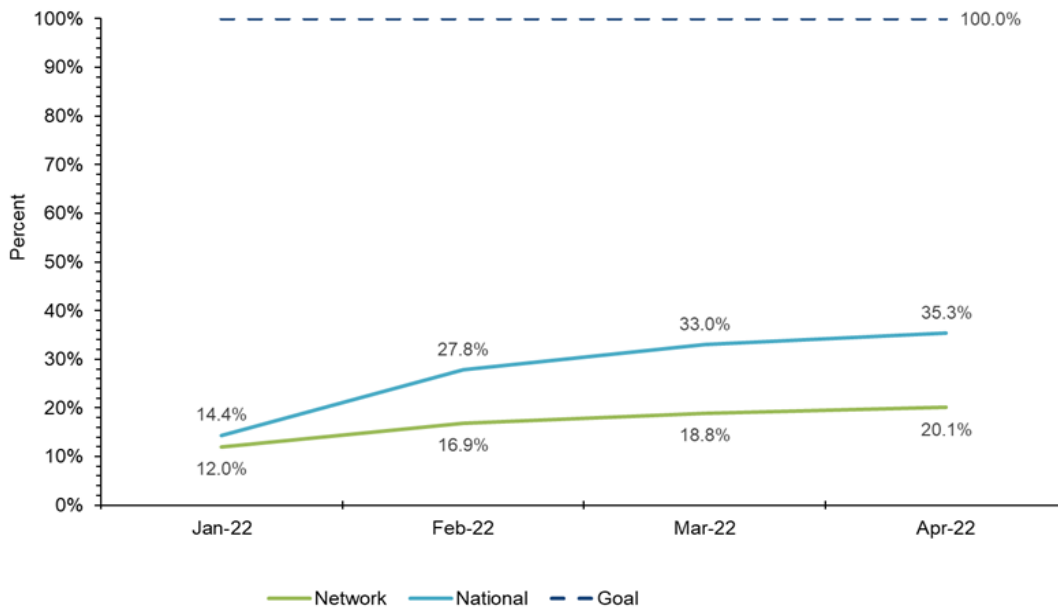
QIA: Quality Improvement Activity
Source of data: ESRD NCC accessed April 2022

Network 9: COVID Vaccination Rate (Dialysis Facility Staff)
July 2021 - April 2022



QIA: Quality Improvement Activity
Source of data: ESRD NCC accessed April 2022

Network 9: Percent of Fully Vaccinated Dialysis Facility Staff Receiving COVID Vaccination Booster
December 2021 - April 2022



QIA: Quality Improvement Activity
Source of data: ESRD NCC accessed April 2022

Data Quality (Admissions, CMS Form 2728, CMS Form 2746) June-April 2022

Project Overview

The Network sought to attain the following goals:

- Achieve a 2% relative improvement in the rate of patient admission records from dialysis facilities entered within five days
- Achieve a 2% relative improvement in the rate of initial CMS-2728 forms submitted from dialysis facilities within 45 days
- Achieve a 2% relative improvement in the rate of CMS-2746 forms submitted from dialysis facilities within 14 days of the date of death

The data used for the project reflect a 12-month rolling average.

Measure	Baseline January 2020 - December 2020	Goal (+2%)	Remeasure July 2021 - April 2022
Admissions within 5 business days	69.09%	70.47%	67.55%
2728 Forms Within 45 days	76.58%	78.11%	73.55%
2746 Forms Within 14 days	65.03%	66.33%	63.29%

Interventions

The Network sent reports of missing data to facility leadership, including the nurse manager, medical director, and administrator. This included, but is was limited to, reports on 1) Missing 2728 and 2746 forms 2) First event, not new to ESRD 3) System discharges 4) Misaligned treatment and training and 5) Gap reports. In addition, the Network sent compliance reports to facilities based on their data submission compliance related to admissions, 2728 and 2746 forms. The Network maintained contact information for all facilities, including email addresses of key personnel, in the IPRO ESRD Contacts Management System. The Network used this information to communicate with all facilities in its service area, with capability to share facility specific information with all leadership staff of a facility in one email, using Adobe Mail Merge. This process allowed the Network to send emails within a few hours of receiving data from the ESRD NCC.

The Network developed the Possible Duplicate / Near Match Form to assist facilities with admitting patients into EQRS, when the when the LDO batch system failed and facility staff were not able to admit the patient. The Network enforced “Patient Roster Verification” on a monthly basis to ensure all patients were accounted for at each facility. This topic is a recurring educational activity on **IPRO Learn**.

The Network also conducted an activity in which facilities viewed a recording on how to read and act on “Reports sent by the Network.” The Network directed facilities to conduct RCAs to identify barriers to achieving the EQRS compliance goals. Best practices collected from high-

performing facilities were distributed to all facilities with a goal to assist them in improving their processes. All resources are available for facilities to access in the IPRO ESRD Help Desk.

Barriers to achieving goals

Communication was identified as a barrier between independent facilities and facilities of various corporations. Facilities are not always sure whether the patient will be admitted permanently or temporarily, and are hesitant to admit them until 30 days have passed. Delays in admissions caused by the EQRS 'Possible Duplicate' error were also identified as a barrier, because they required the Network to complete the admission on behalf of the facility. The inability of transplant centers to admit patients into EQRS required the Network to prioritize transplant admissions over dialysis. Challenges with staffing due to the pandemic were also identified as a major barrier in 2021. Additionally, the pandemic contributed to greater challenges in obtaining doctors' signatures for 2728 Forms and in fulfilling the requirement to obtain cause of death and date of death information from hospitals for 2746 Forms.

Best practices spread to achieve goals

In February 2022, the Network used **IPRO Learn** to survey dialysis facilities on what they considered best practices in meeting EQRS data compliance. These best practices were shared with dialysis facilities under the following categories:

Teamwork & Communication

- Encourage facilities to have their whole team responsible for compliance and submission of 2728/2746 Forms.
- Promoting good communication across facilities and corporations between the people that directly conduct the work needed to meet EQRS compliance: nursing staff inputting information into the computer, and staff that works with doctors on signing the 2728 Forms.
- Assigning a capable and responsible person to complete the task is important, as well as having a back-up person to perform the tasks whenever the primary person is unavailable.
- Defining the responsibilities involved in the Forms completion process and holding the staff member accountable for the tasks.
- Ensuring the contact person at the doctors' offices knows about the requirement for the doctor to sign the 2728 Forms.
- Reaching out to hospitals as soon as possible to get COD (Cause of Death), or using '99 Unknown' if that information is not available, whenever the facility finds out that a patient has died.

Scheduling & Organizing

- Budgeting time to prioritize admission submission of Forms in a timely manner.
- Completing the Forms on the day of filing the care plan will help staff recall each patient.
- Creating a calendar of activities in which tasks are plotted to help the person completing Forms.

- Logging into EQRS on a weekly basis to see if there are any outstanding Forms that need to be submitted.
- Keeping organized, using checklists to ensure everything is done.
- Setting an alert and reminder of events a few days before the deadline.
- Inputting the patient into EQRS the day of admission and starting the 2728 Form that day.
- Using an Excel sheet to keep track of tasks that need to be completed.
- Checking which patients have been admitted/discharged each day and updating EQRS as needed in real-time.

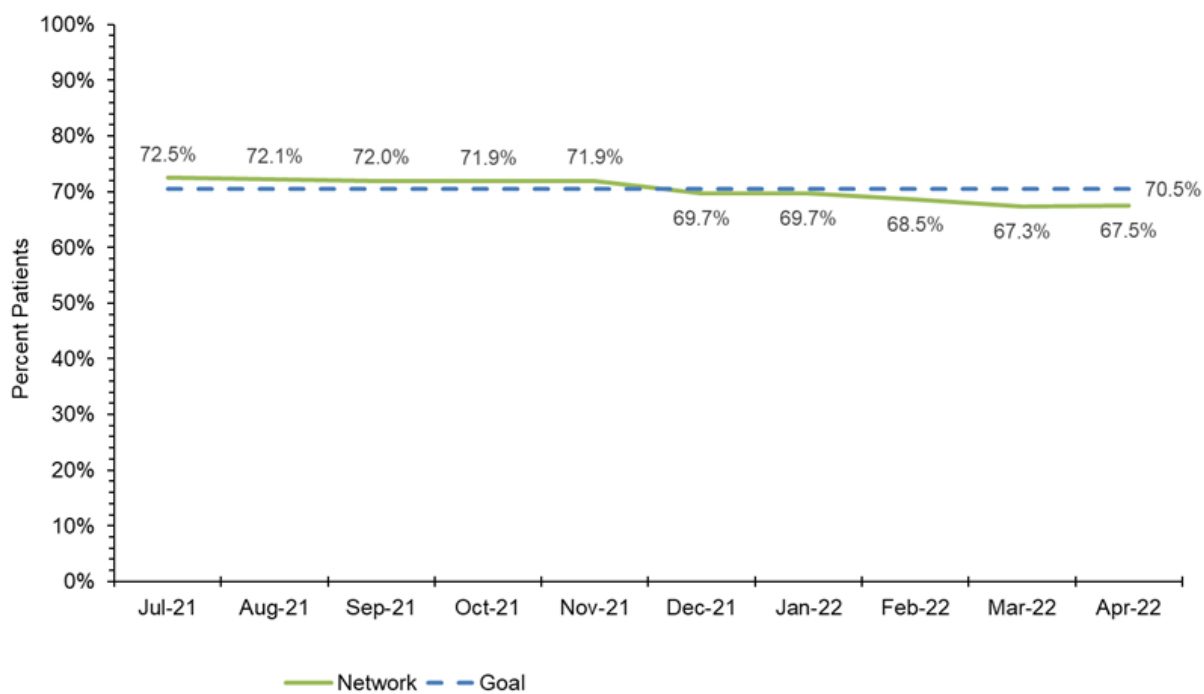
CMS Requirements & Training

- Providing re-education to staff on timely admission of data into EQRS.
 - [Admit with 5 business days], [2728 Form within 45 days], [2746 Form within 14 days]
- Making sure you have the information needed [all required fields] to submit all Forms timely.
- Promoting Network and CMS resources for new EQRS facility users to learn about expectations.

Network Staff also provided suggestions for Best Practices

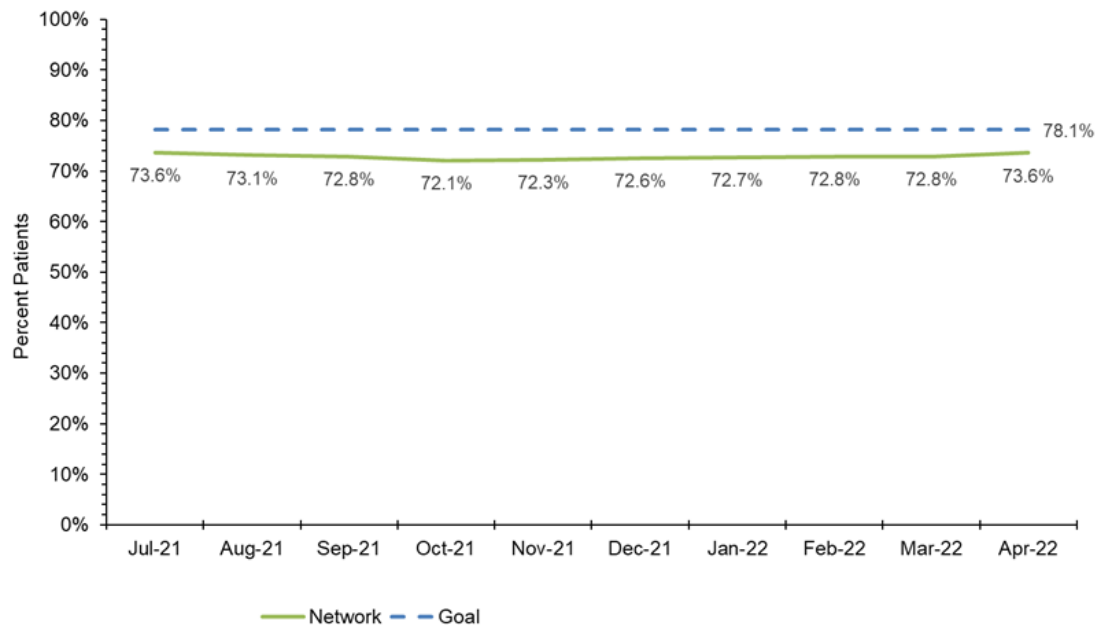
- At least two staff members per 50 patients should have access to EQRS.
- Reminders that only 2728 Form needs signature; 2746 Form does not need any signatures.
- Reviewing reports sent by the Network that show missing 2728 and 2746 Forms.
- Running the Patient Roster Report regularly to see which patients need to be admitted.

Network 9: Admission Data Entered within 5 Days July 2021 - April 2022



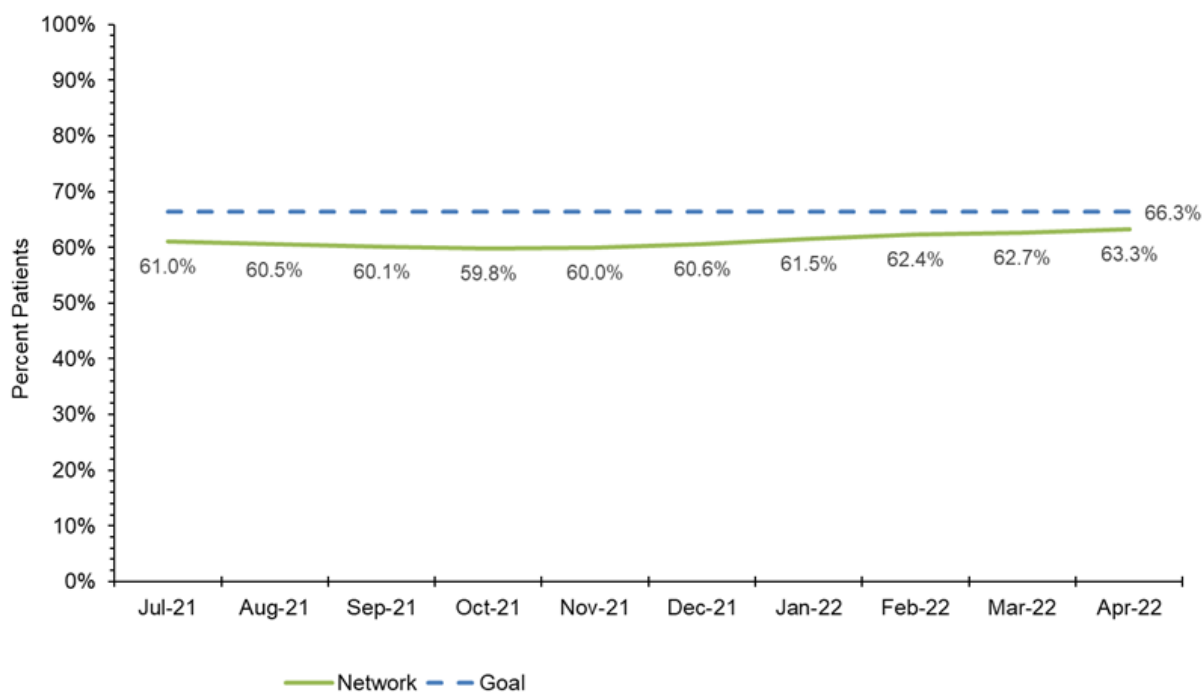
QIA: Quality Improvement Activity
Source of data: ESRD NCC accessed May 2022

Network 9: CMS-2728 Forms Submitted within 45 Days
July 2021 - April 2022



QIA: Quality Improvement Activity
Source of data: ESRD NCC accessed May 2022

Network 9: CMS-2746 Forms Submitted within 14 Days of Death July 2021 - April 2022



QIA: Quality Improvement Activity
Source of data: ESRD NCC accessed May 2022

Hospitalization (Inpatient Admissions, ED Visits, Readmissions and COVID-19 Admissions) June -April 2022

Project Overview

There are numerous reasons why a dialysis patient may not be able to achieve and maintain optimal health that can lead to increased utilization of the hospital system. Health deficits that lead to hospitalizations, readmissions, and outpatient emergency room visits frequently are related to diagnosed and undiagnosed physical and mental health conditions. The Network worked with dialysis facilities to decrease hospitalizations, 30-day unplanned readmissions, and outpatient emergency room visits (non-COVID related) by 20% over the next five years. Hospitalization reasons that most frequently occur in the ESRD population, include, but are not limited to anemia, bloodstream infections, access infections and complications, high blood potassium levels, hypertension and congestive heart failure. During the base year (June 2021 to April 2022) the required reduction was 2%, with goals for reduction increasing incrementally over the five-year contract.

The baseline data for this project were collected from Medicare Claims for the period of January- December 2020. The Network team's efforts resulted in the following outcomes: reduced hospitalizations from 6,644 at baseline (BL) to 4,585 over the 11-month remeasurement period (June 2021- April 2022); reduced readmissions from 728 at BL to 441 instances at remeasurement; and reduced emergency room visits from 3,581 at BL to 2,605 instances at remeasurement. The Network achieved a greater than 2% reduction in all measures and performed at the national benchmark for hospitalization and unplanned readmissions. The Network also worked to reduce hospitalizations with primary diagnoses related to COVID-19 by 25% from BL. The Network's promoted vaccination for the immunocompromised ESRD community. With new strains of COVID-19 evolving during the remeasurement period, the Network rapidly addressed each increase in admissions due to COVID-19 to decrease spread of each of the strains. The number of admissions at BL was 2,361. At time of remeasurement the Network reduced admissions to 1,503, which was below the upper limit of allowable admissions by 220; and achieved a 25% relative reduction goal.

Interventions

Improving transitions between care entities was the primary focus of the Network's interventions. The Network worked with facilities to establish Transitions Champions, who assisted patients transitioning from acute care to the dialysis facility. These Champions provided medication education, helped transitioning patients understand their discharge diagnoses and instructions, and helped arrange dialysis scheduling around transitioning patients' outpatient follow-up appointments. The Network provided Champions segmented education using excerpts from the *ESRD Forum Transitions of Care Toolkit* and the *American Hospital Association Readmissions Toolkit*.

The Network tailored interventions to meet facilities' specific needs. When missed treatments were identified as a root cause of hospital admissions, the Network rapidly produced a patient facing FAQ document titled, *Don't Miss A Minute* to educate patients about the dangers of

missed therapy. Facilities were provided education, tools and strategies to decrease hospitalizations in their super-utilizer patients and to help facilities prevent infection in the dialysis unit, with a focus on reducing bloodstream and access infections, rated as the number one and two diagnoses that lead to hospitalization in the Network population.

Interventions aimed at reducing COVID-19 hospitalizations focused on increasing COVID-19 vaccination rates. The Network kept facilities updated on current CDC guidelines for vaccinations and boosters. Facilities that reported COVID-19 hospitalizations were provided technical assistance to create strategies that would help to prevent spread. The Network used CDC guidelines, provided education to reduce spread during holiday celebrations and in multigenerational households and to combat vaccine hesitancy, and worked to improve transitions and communication between dialysis facilities and nursing homes.

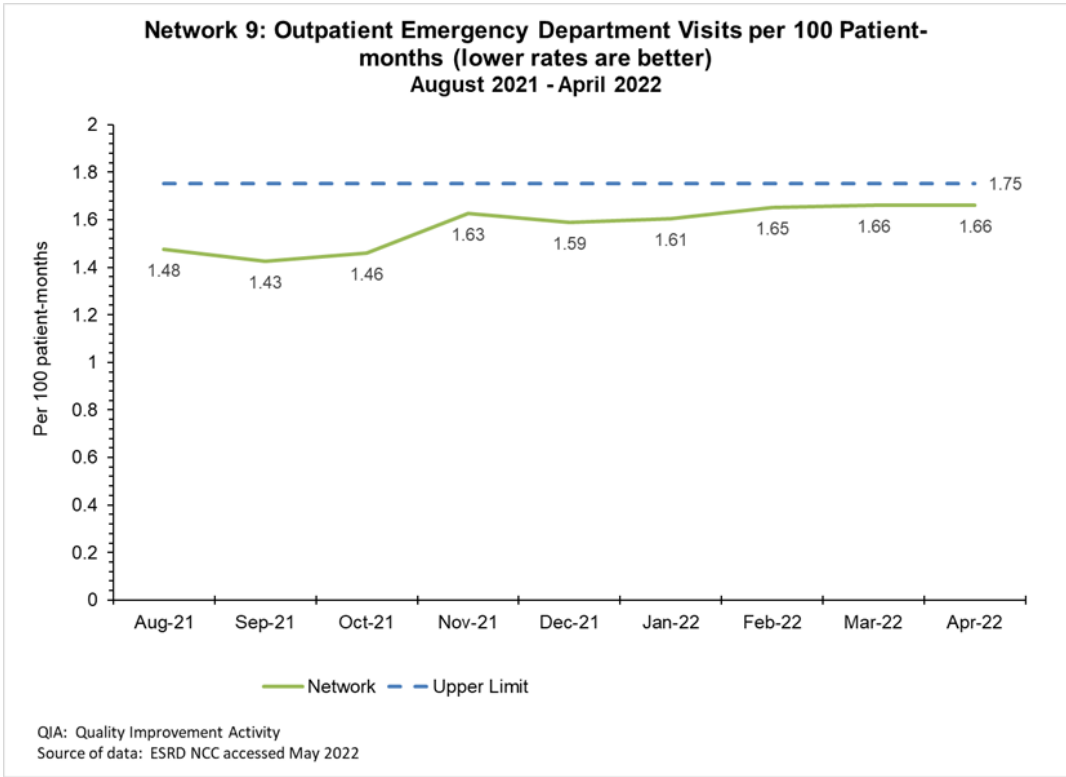
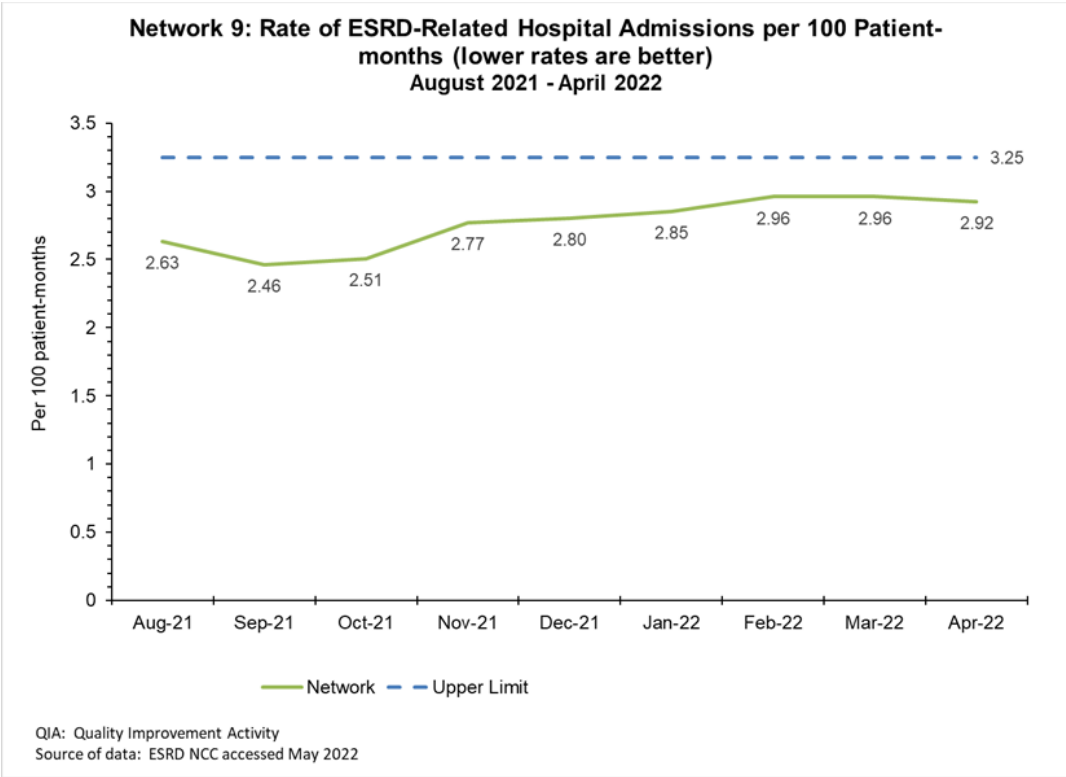
The Network worked with NH associations to improve the transparency of reporting of COVID-19 "persons under investigation" and active COVID 19 cases. The Network promoted a "call ahead culture" to facilitate improved communication at transfer points of COVID-19 patients.

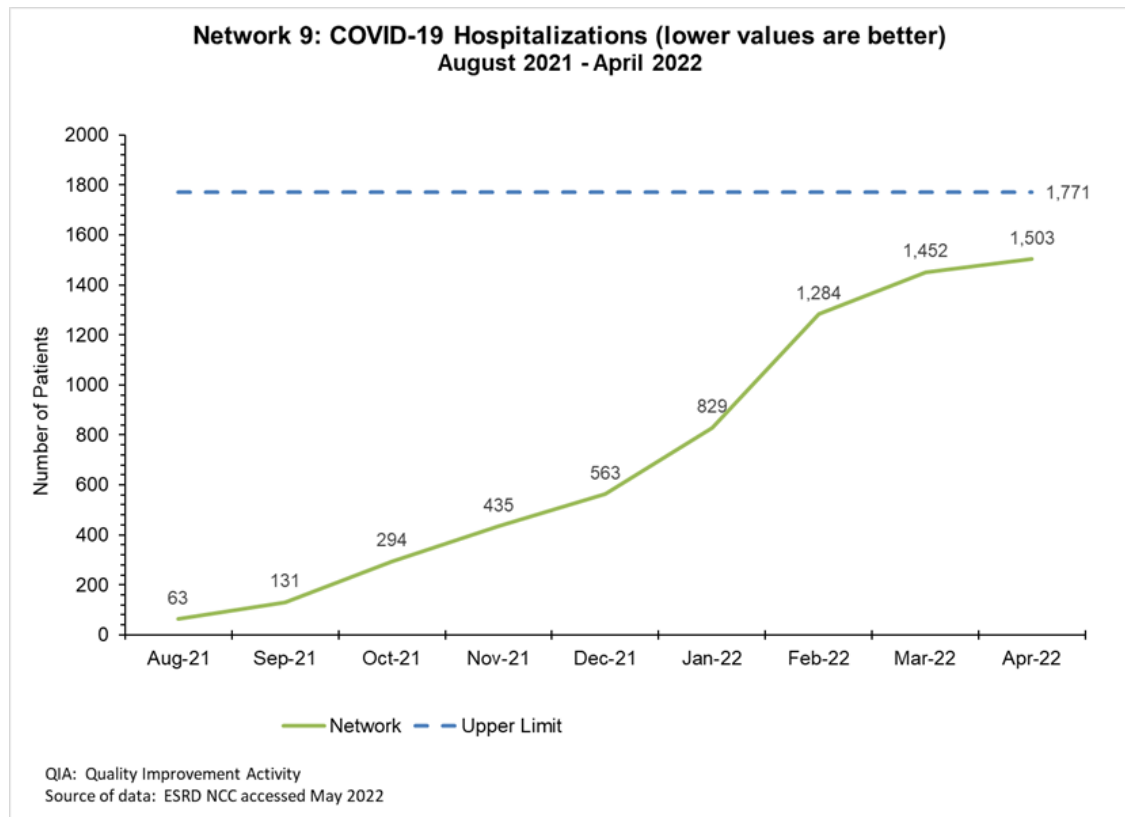
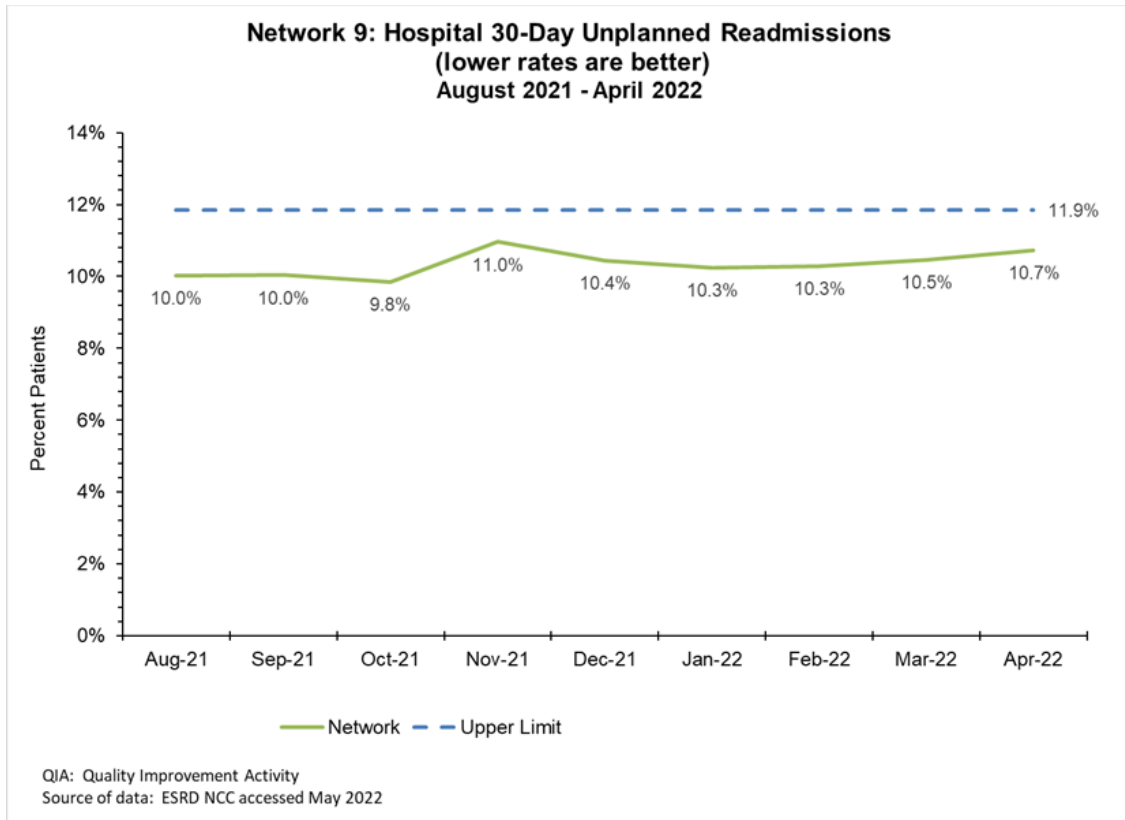
Barriers to achieving goals

The Network identified a major cause of increased hospitalizations and emergency room visits were "super utilizer" patients who could have been managed by a primary care physician. Through an environmental scan and technical assistance calls, the Network learned that facilities that reported that they had no primary care physicians in certain regions had limited access to outpatient services such as vascular interventional facilities and urgent care.

Best practices spread to achieve goals

The Network learned best practices from facilities with high COVID-19 vaccination rates and low COVID-19 hospitalization rates and shared these practices with the community. These high performing facilities incorporated the medical directors in education on vaccination, held vaccine clinic days and shared *Why I Got the Vaccine* statements from fellow patients and staff on a visual display to encourage hesitant patients to obtain vaccinations. In addition, *Wallet Cards To Reduce Hospitalization* were distributed to patients to improve communication between dialysis facilities and hospital staff. When carried by patients, these cards provide a streamlined process to communicate dialysis plans of care to the hospital staff.





Depression June-April 2022

Due to contract goal adjustments, the Network worked toward the goals of this quality improvement activity but was not evaluated on results.

Project Overview

Research has indicated depression affects almost 40% of end stage renal disease patients (Shirazian et al. #). Patients with depression are reported to have a lower quality of life and increased mortality. The Network worked with dialysis facilities to increase the remission of depression amongst patients.

Interventions

Due to data not being available, the Network focused on assisting facilities with appropriate screening documentation and ensuring screenings were being completed as required. Monthly activities focusing on a specific aspect of depression or behavioral health were assigned to the facilities and were completed on **I PRO Learn**. The *Behavioral Health Toolkit* housing several resources outlined symptoms, screenings, treatment options, and tools for additional behavioral health diagnoses. Some of these resources include the *Dialysis Patient Depression Toolkit*, *Zone Tool: Self-Management for Depression*, and the caregiver resource *When Your Loved One is Depressed: Tips on How You Can Help*. The Network frequently spoke with facilities to provide one-on-one technical assistance to assist in creating processes for entering depression screenings and brainstorming interventions to increase patient participation in mental health services.

Barriers to achieving goals

A root cause analysis determined the top barriers for patients accessing mental health were the stigma associated with seeking assistance and limited access to mental health services. Factors causing these barriers included denial of the presence of symptoms, lack of resources, and limited education. Barriers associated with accurate data collection and reporting in EQRS were also identified. The Network recognized education was needed on the specific depression screening choices and definitions.

Best practices spread to achieve goals

While several facilities noted they had a process in place for assessing and monitoring depression symptoms and treatment, the Network observed a communication breakdown when it came to reporting depression screenings and the follow-up process. To assist facilities in reporting in EQRS accurately and on a monthly basis the Network developed the *Facility Guide to Entering the Clinical Depression Assessment in EQRS*. Each month the Network promoted a resource that targeted a specific aspect of depression and a suggested method for integrating education into the facility culture and procedures. Facilities reported sharing the interventions with their staff through their monthly QAPI meetings, staff huddles, and using them as patient education.

Nursing Home June-April 2022

Due to contract goal adjustments, the Network worked toward the goals of this quality improvement activity.

Project Overview

Networks were tasked with achieving a 4% reduction in hemodialysis catheter infection rates in dialysis patients receiving home dialysis within nursing homes, a 2% decrease in the incidence of peritonitis in dialysis patients receiving home dialysis within nursing homes, and a 2% decrease in the rate of nursing home dialysis patients receiving a blood transfusion.

Interventions

The Network identified one home hemodialysis CCN that provide 5 time/week dialysis treatments for ESRD patients receiving care within a skilled nursing facility (SNF). The Network provided technical assistance for developing a process for the three facilities to self-report data, track and review claims data. The facility experienced a fluctuating census, as the majority of patients were in SNFs with an average length of stay of 21 days. There were also instances of “0” census. The facilities participated in the weekly technical assistance and completed training on reporting in EQRS and NHSN.

NCC data showed the Network met the CMS goals for blood transfusions and hemodialysis catheter infections. No data were provided for peritonitis rates. Lack of “real time” data did not allow for data driven technical assistance during the project or specific focused assistance. The Network developed an EQRS job aid in **IPRO Learn** and collected data on all residents receiving dialysis care in the SNF as well as on patients who traveled to an in-center dialysis facility.

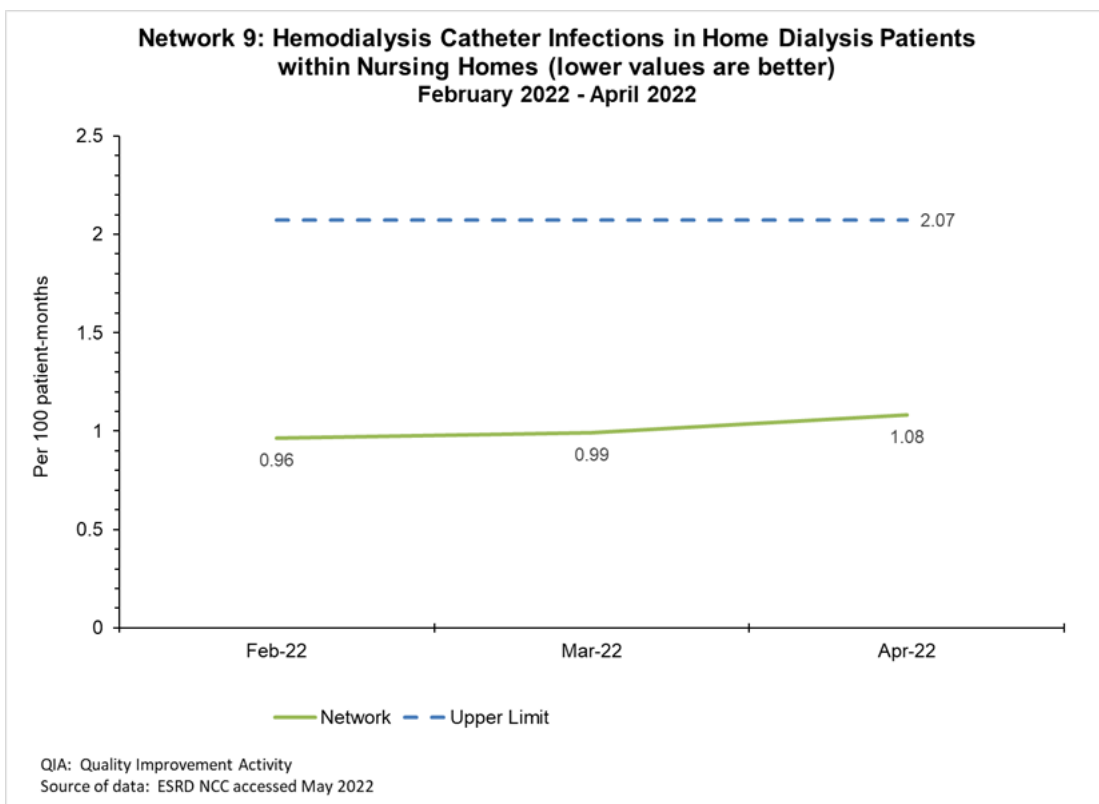
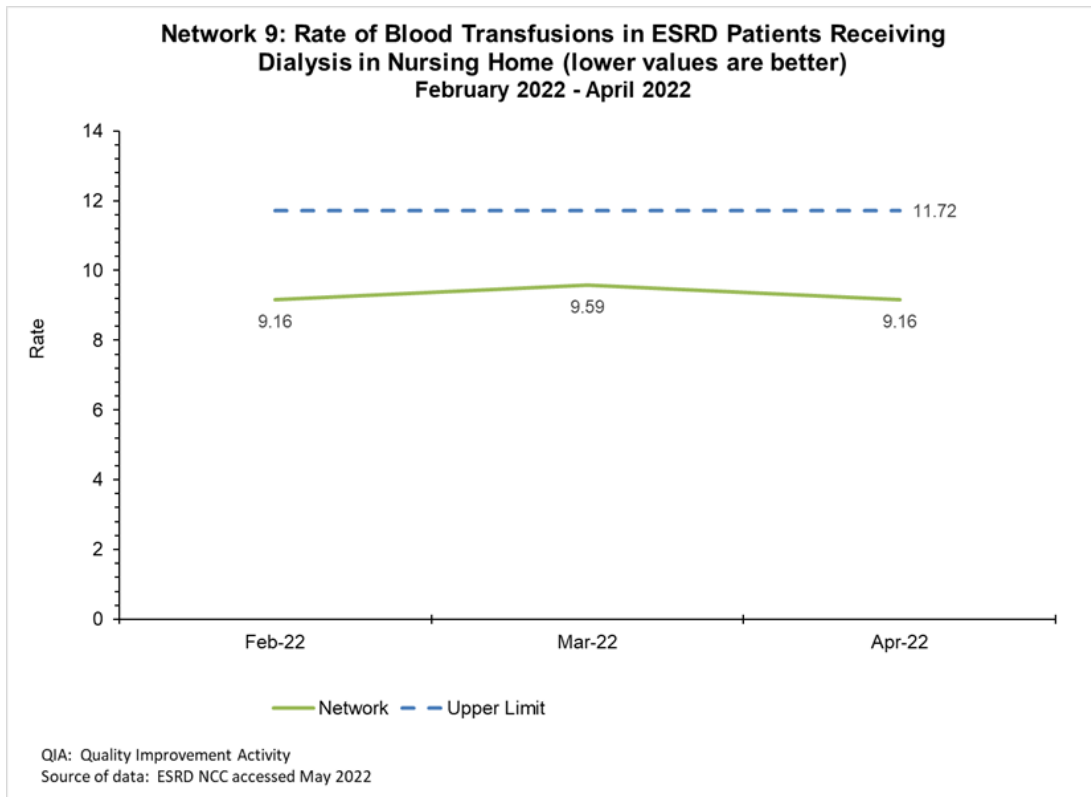
Using **IPRO Learn**, the Network deployed educational materials including tool kits, focused educational videos, continuing education offerings and knowledge assessments. All technical assistance tools were reviewed and approved by the Network Advisory Committee. **IPRO Learn** collected data demonstrating active participation by ESRD facilities and measuring spread of interventions into the renal community.

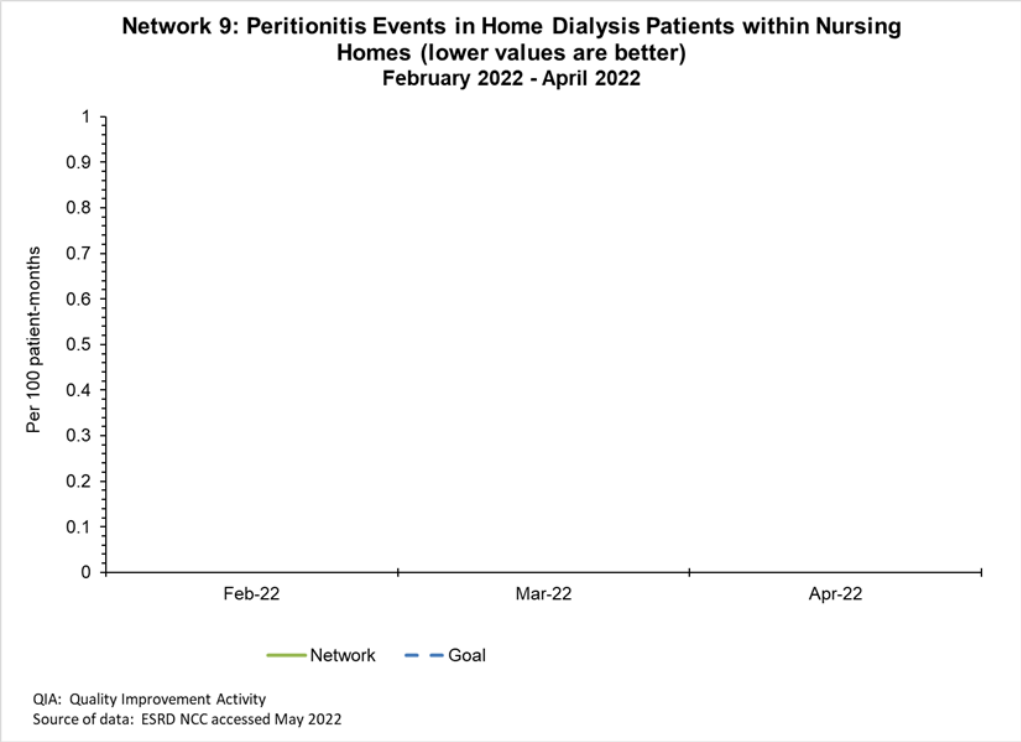
Barriers to achieving goals

The primary barrier was a lack of NHSN, EQRS and claims data from the coalition facilities, resulting a generalized approach, rather than focusing education on specific social determinants of health, identified population characteristics or patient outcomes. The Network also worked directly with the ESRD NCC to clarify data definitions to educate facilities on the remeasurement reports, since they were the Network’s only data source for this group.

Best practices spread to achieve goals

The use of non-vetted data allowed for improved dialogue and communication on practices within the various clinics. The Network educated facilities quality of care during staff shortages, CMS requirements related to data collection for different initiatives (QIP, Compare, CC), and the value of accurate reporting to enable recognition and spread of quality practices.





Telemedicine June -April 2022

Due to contract goal adjustments, the Network worked toward the goals of this quality improvement activity but was not evaluated on results.

Project Overview

Telemedicine use grew nicely from January - March of 2022 and then leveled off in April. This directly coincides with COVID-19 case counts in the Network's service area, as they were highest in the period when most of the telemedicine visits occurred and dropped off when the community went back to business as usual and stopped the use of telemedicine. This drop resulted in the Network completing 457 of the 505 telemedicine visits that were required to meet the CMS 2% improvement goal as of April 2022.

Interventions

The Network noted this usage pattern change immediately and worked rapidly to release an FAQ titled *Telemedicine is Here to Stay: And Here's Why*, focusing on educating patients and providers about the importance of maintaining use of telemedicine, especially as it related to increasing rural patients' access to a home therapy.

Network staff also released telemedicine performance reports that provided UPI specific information for rural patients who had not utilized telemedicine and worked to connect providers with easy-to-use platforms to support the telemedicine visit.

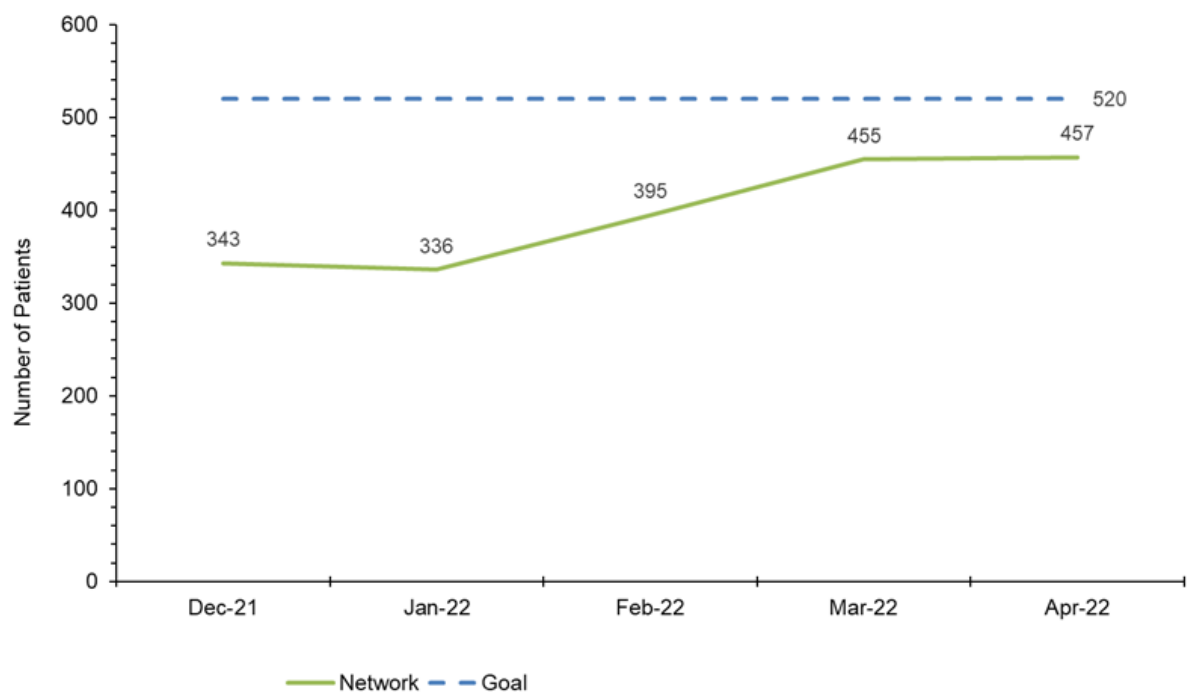
Barriers to achieving goals

A major barrier identified by the Network was that clinics had not operationalized or integrated the use of an easy technology for patients and staff into their practice. In addition, once reimbursement for phone only telemedicine visits ceased to be at the same level as reimbursements for in-person or video clinic visits, and the threat of disease transmission lessened, many reverted back to in-person clinic visits.

Best practices spread to achieve goals

One of the physician practices in Ohio identified that the free HIPPA compliant telemedicine platforms, *Doximity* and *Doxy.me*, were very effective in maintaining a telemedicine program, since patients were able to use the platforms without subscribing, and the platforms could be accessed via a link in a text at the time of the appointment, making it easy to use for all. The Network-developed FAQ, *Telemedicine is Here to Stay: And Here's Why*, which contained links to these technologies, shared best practice with the community, and provided information about benefits of telemedicine use for all patients, and especially for those patients living in rural areas who may have to travel long distances to meet in person for a clinic visit.

Network 9: Number of Rural ESRD Patients Using Telemedicine
December 2021 - April 2022



QIA: Quality Improvement Activity
Source of data: ESRD NCC accessed May 2022

Vaccinations Pneumococcal-23 and Staff Influenza June-April 2022

Due to contract goal adjustments, the Network worked toward the goals of this quality improvement activity but was not evaluated on results.

Project Overview

Pneumococcal disease can lead to serious, possibly deadly, illnesses such as pneumonia, meningitis, and sepsis. Anyone can get these diseases, but some people have a higher risk. People with the highest risk include infants, people 65 years and older, and adults of any age with certain health and immunocompromised conditions such as ESRD and transplant patients.

The CDC guidelines for vaccination in the ESRD community changed as of April 1, 2022. Current guidelines for renal patients are: One PSV 13 vaccine, followed a year later by PPSV 23. The first PPSV vaccine should be followed by second and third vaccines, at five -year intervals for patients to receive a total of three PPSV 23 vaccines in a lifetime. The Network implemented strategies within dialysis facilities to increase the number of PCV 13 and PPSV 23 vaccines for patients with ESRD, with a focus on vaccine uptake for patients 65 years and older, and a goal to increase the rate of influenza vaccination to 90% of facility staff.

Interventions

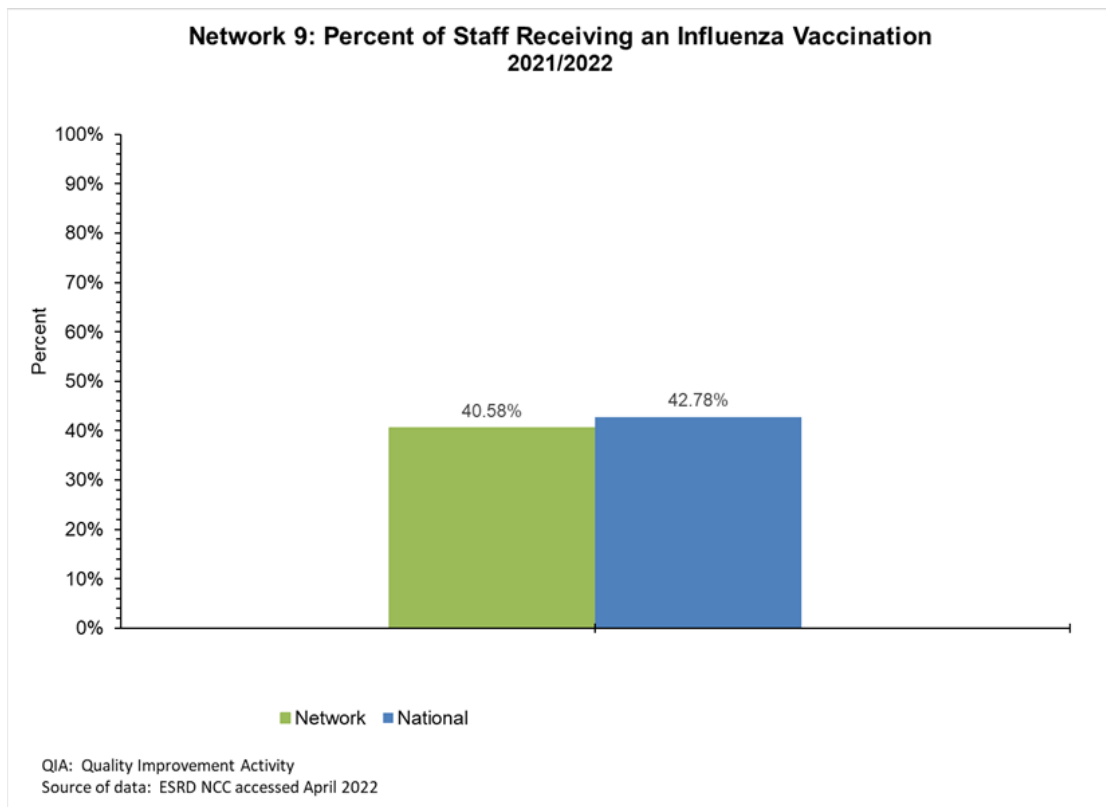
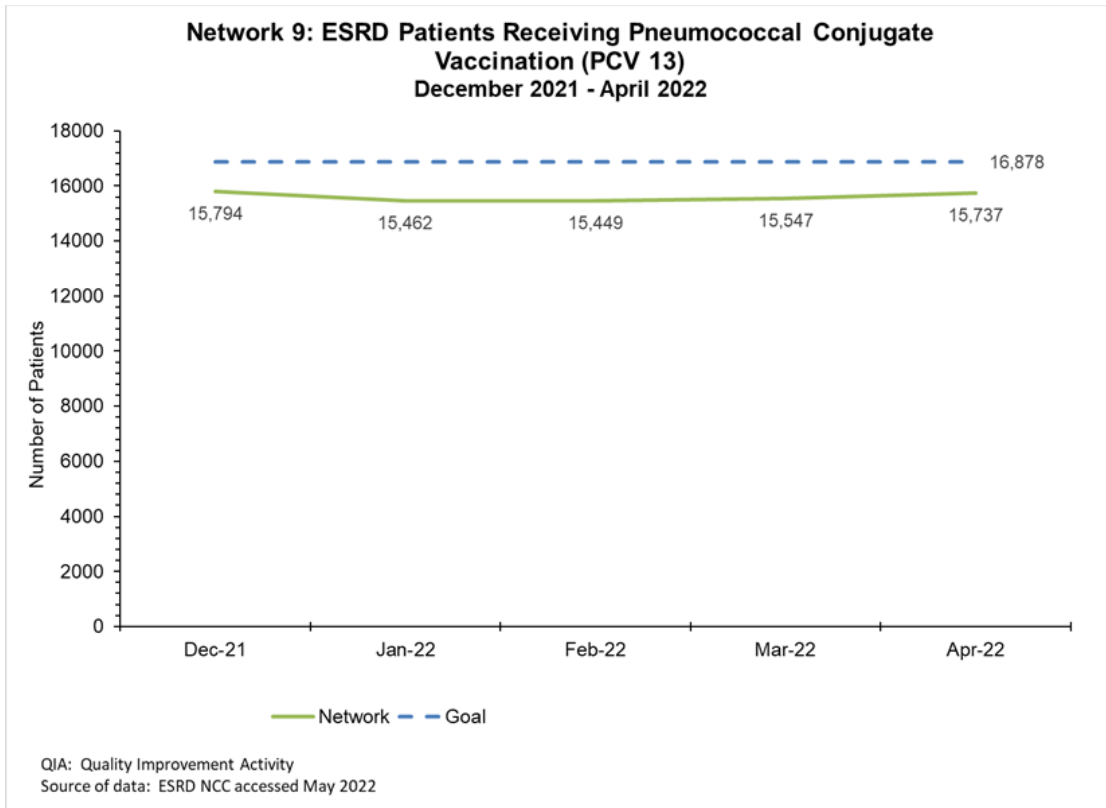
The Network focused its approach on educating patients about the importance of pneumococcal vaccination, in preventing pneumococcal disease. Patients were provided with *PCV13 and PPSV23 Vaccination Algorithm for Individuals with Chronic Renal Failure or Nephrotic Syndrome* per CDC and ACIP Guidelines, as well as a booklet to document vaccinations provided at the dialysis facility and by outside providers.

Barriers to achieving goals

The inability to monitor and track the uptake of vaccines in the community was a large barrier. The CDC guidelines for pneumococcal vaccine administration in the ESRD population changed in the baseline year. This presented a challenge with staff being unfamiliar with the change and interpreting the guidelines. Capturing vaccination information from alternate sites (hospitals, outpatient clinics and pharmacies) was an ongoing challenge for the dialysis facilities. The Network identified confusion among facility staff regarding how vaccine administration dates should be recorded in the EQRS. During the baseline year, patients and staff were asked to receive multiple vaccines—a request that many were resistant to; staff being particularly reluctant to be vaccinated if fellow co-workers had not. While documentation in the NHSN database of healthcare personnel vaccinations was required, many facilities did not have access to the NHSN database and/ or lacked knowledge of the process.

Best practices spread to achieve goals

The Network leveraged **IPRO Learn** by focusing on the importance of all necessary vaccinations for the ESRD patient and offered continuing education credits to encourage viewing by facility staff. One facility staff member shared: *"I was able to get 100% of my staff fully vaccinated. The Network had several vaccine administration days in the clinic which helped some patients and their families get the vaccine."*



ESRD NETWORK RECOMMENDATIONS

Facilities that Consistently Failed to Cooperate with Network Goals

The Network has garnered facility support throughout our community to support Network initiatives and goals, even with modifications due to the pandemic. The Network did not identify any facilities in its service area who failed to cooperate with the goals.

Recommendations for Sanctions

The ESRD Network does not recommend any facility for sanctions.

Recommendations to CMS for Additional Services or Facilities

The Network would like to recommend the following services/facilities:

1. Organization of a national education effort to increase nephrology education for all disciplines and promote increased interest in this professional path: Creation of a national program to recruit and build nephrology physicians, nurses, social workers, registered dietitians, and technicians, which can support increased chronic kidney disease (CKD) efforts, maintain ESRD care and advance QI initiatives in CKD and ESRD.
2. Enhance surveillance of Nursing Home - Home Dialysis Providers by better CCN delineation to capture location of services and increased offering of this service line in the Network.
3. Growth of Home Support staffing to offer training and increase the number of patients receiving treatment in their homes Free up regulations to allow nursing oversight of training, but only nursing to conduct training.
4. Add transportation, dental, and social support network services to overcome barriers in transplantation.



ESRD NETWORK COVID-19 EMERGENCY PREPAREDNESS INTERVENTION

As part of the Network responsibility to respond to emergency events, the Network monitored the COVID-19 virus for potential impact, and strategized support needs for the ESRD community.

The Network relied on collaborations with, and information sharing from, the ESRD NCC, CDC, CMS, KCER, Indiana, Kentucky, and Ohio state health departments, large dialysis organizations (LDOs), patient-advocacy groups, renal listservs, and other stakeholders, to stay abreast of changing guidance. The Network used a number of processes to communicate information and/or guidance to facilities and patients. These methods were based on strategies that had previously been found to be effective in that population based on the controls the Network had in place. Critical information (guidelines, waivers, tools, resources, requests to assess local/regional impact, and strategies to address barriers to access to care) were disseminated to dialysis facility staff and/or patients via electronic newsletters, email, fax, website postings, webinars, blogs, and social media. The Network continued to maintain COVID-19 designated pages for both patients and professionals on our website, where new resources are easily identified by “New!” to alert the ESRD community of timely content. The Network created a COVID-19 banner that directed facility providers, patients, and stakeholders to updates on our website. This banner continues to appear in all Network emails and communications. The Network implemented a number of controls to ensure timely receipt of information and guidance sent to dialysis facilities.

To ensure that our community had the tools, information and supplies needed to sustain operation during the pandemic, the Network logged and tracked all calls and communications from facilities, the departments of public health (DPH), and offices of emergency management (OEM) to assess reductions in staff, availability of personal protective equipment (PPE), implementation of infection prevention measures, and to promote CDC guidance. The Network actively worked to prevent access to care issues related to lack of transportation, secondary to COVID-19 and non COVID-19 problems. By conducting environmental scans via focused communications with facility social worker/facility administrators, contacts at the states’ OEMs and other transportation companies, the Network was able to understand and appropriately address transportation concerns.

ESRD NETWORK SIGNIFICANT EMERGENCY PREPAREDNESS INTERVENTION

For individuals who have been diagnosed with ESRD, missed dialysis treatments can have serious adverse health effects. This makes the ESRD patient population especially vulnerable during emergencies and disasters. The Network relies on longstanding partnerships with state health departments, offices of emergency management, and large dialysis organization emergency management teams to ensure safety and continuity of care for ESRD patients in Indiana, Kentucky, and Ohio.

Staffing Shortage

The Network assembled Advisory Committee (AC) members to guide our work within the service area, and established community coalitions focused on each Objective and Key Result (OKR). As the Network initiated this work, AC members shared information about the healthcare staffing crisis that existed due to resignations and other staffing losses. As the Network reached out to perform technical assistance, the number one barrier encountered was a lack of the necessary personnel or qualified personnel to perform the quality improvement work. The Network worked to help facilities mitigate barriers by suggesting alternate means and methods to offer education and support for quality improvement activities, advocating for a team approach to help move the project forward, and involving engaged patients to assist the interdisciplinary team. The Network focused efforts on reaching out to all chairside staff members to be part of the solution by offering education resources and interventions that all staff as well as patients could support. These efforts were beginning to gain traction until October - November 2021 when COVID-19 case counts rose. The resurgence of the pandemic again required that the primary quality improvement effort be directed at disease transmission prevention and had a secondary effect of further reducing staffing available. The Network worked to maintain a balance of moving quality improvement efforts forward, where possible, while providing technical assistance to support facilities with COVID outbreaks throughout this period. In this regard, Network efforts focused on highlighting education and outreach on the need for vaccination and booster shots. Most facilities struggled with these issues into the new year. In February – March 2022, when cases started waning, the Network was again able to fully engage facilities in the new work. Many facilities are still running with open positions, but the Network received notice that some of the key positions are being filled, and staff are being trained to fill the void in the community. As resources stabilize, the Network continued to strive to link new leads to the projects and maintain ongoing education and communication focused on reaching each OKR.

ACRONYM LIST APPENDIX

This appendix contains an [acronym list](#) created by the KPAC (Kidney Patient Advisory Council) of the National Forum of ESRD Networks. We are grateful to the KPAC for creating this list of acronyms to assist patients and stakeholders in the readability of this annual report. We appreciate the collaboration of the National Forum of ESRD Networks especially the KPAC.