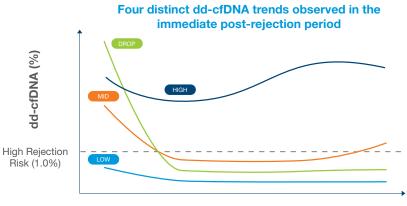
Insights for post-rejection care with Prospera<sup>™</sup> dd-cfDNA surveillance1



**Time Post Rejection Diagnosis (weeks)** 

#### **Key findings**<sup>1</sup>:

- Post-rejection Prospera™ dd-cfDNA trends are prognostic of 1-year outcomes: Longitudinal dd-cfDNA patterns following treatment (e.g. LOW, DROP vs MID, HIGH) were strongly associated with 1-year clinical outcomes, including renal function recovery, recurrent rejection, DSA formation and graft loss.1
  - 97.6% (40/41) of cases with sustained elevated dd-cfDNA levels (HIGH or MID) experienced negative outcomes.1
  - Overall, patients with lower-risk dd-cfDNA trends were 60x more likely to have a positive outcome than those with higher risk trends.1
- Trends of dd-cfDNA post-rejection may serve as a molecular indicator of treatment effectiveness: Prospera™ may help clinicians identify "favorable prognosis" versus "unfavorable prognosis" to immunosuppression before changes in serum creatinine levels. 1 In this study, creatinine trends had no statistical correlation with outcomes.2



"Following a rejection episode, understanding the long-term prognosis and risk is critical in making ongoing treatment decisions for the patient. These findings make it clear that dd-cfDNA is an important non-invasive tool to provide more accurate risk stratification post-rejection that will enable more personalized patient management and improve long-term graft survival."

SUPHAMAI BUNNAPRADIST, M.D., PRINCIPAL INVESTIGATOR OF THE PEDAL STUDY2

Start the conversation about integrating Prospera<sup>™</sup> into your surveillance protocol. Contact Natera today.



Read the publication

\* Data based on this initial publication may be subject to change based on the final results of the PEDAL Study

#### References

- 1. Bunnapradist, et al. Associations between donor-derived cell-free DNA dynamics and clinical outcomes
- after kidney allograft rejection: A prospective, multicenter study. Am. J. Transplant, 2025.
  2. Natera, Inc. (2025, July 24). PEDAL Study Successful, shows monitoring with Prospera™ Kidney provides accurate prognosis of long-term clinical outcomes following rejection; now published in AJT. Business

Wire. Retrieved August 14, 2025, from https://investor.natera.com/news/news-details/2025/PEDAL-Study-Successful-Shows-Monitoring-with-Prospera-Kidney-Provides-Accurate-Prognosis-of-Long-Term-Clinical-Outcomes-Following-Rejection-Now-Published-in-AJT/default.aspx





# Prospera<sup>™</sup> in practice: Prognostic power & insights from the PEDAL study

Real-World Evidence in Post-Rejection Monitoring Using Donor-derived Cell-Free DNA (dd-cfDNA)

The PEDAL Study is the **first prospective, multicenter clinical study** to evaluate how dd-cfDNA dynamics after biopsy-proven rejection can predict long-term kidney transplant outcomes.¹ Across 28 participating centers, the study demonstrated that Prospera™ dd-cfDNA trends over the 8-week post-rejection window were significantly associated with clinical outcomes at 12 months.¹

**Four distinct dd-cfDNA patterns**—categorized as LOW, DROP, MID, and HIGH—helped differentiate those with "favorable prognosis" from "unfavorable prognosis" to rejection treatment, providing a non-invasive molecular lens into post-treatment graft health.<sup>1</sup>

This booklet highlights four case studies, each aligned with a different dd-cfDNA trajectory observed in the PEDAL Study<sup>1</sup>:

Case 1: LOW

A patient with persistently low dd-cfDNA levels and full renal function recovery

Case 2: DROP

A case with initially high but sharply declining dd-cfDNA, associated with a favorable prognosis

Case 3: MID

A patient whose dd-cfDNA levels decreased then rebounded, correlating with poor outcome

Case 4: HIGH

A patient with persistently elevated dd-cfDNA and multiple adverse events

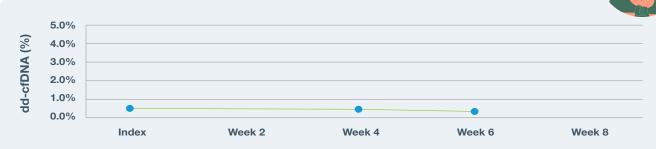
Together, these real-world cases underscore the clinical value of Prospera<sup>™</sup> in the post-rejection setting, helping clinicians personalize management decisions, adjust surveillance intensity, and act proactively in response to molecular trends.

## When rejection resolves: LOW and DROP trend profiles<sup>1</sup>

#### CASE 1 (LOW Group)1:

A patient with persistently low dd-cfDNA levels and full renal function recovery





- Rejection Type: T-cell mediated rejection (TCMR) 1A
- Serum Creatinine: Decrease from 2.48 mg/dL to 1.96 mg/dL



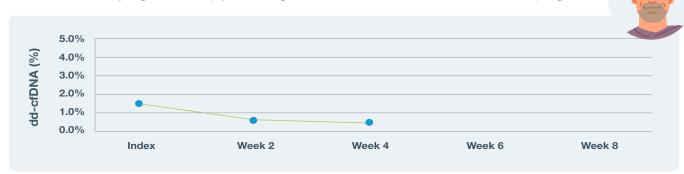
**Outcome:** No adverse events at 1 year



**Key takeaway:** Consistently low Prospera<sup>™</sup> dd-cfDNA trends post-rejection may be associated with full recovery.¹

#### CASE 2 (DROP Group)1:

A case with initially high but sharply declining dd-cfDNA, associated with a favorable prognosis



- Rejection Type: TCMR 1A
- Serum Creatinine: Decrease from 1.14 mg/dL to 1.06 mg/dL



Outcome: No adverse events at 1 year



**Key takeaway:** High initial Prospera<sup>™</sup> dd-cfDNA levels that drop rapidly may reflect sufficient treatment response.<sup>1</sup>

# When rejection persists: MID and HIGH trend profiles<sup>1</sup>

#### CASE 3 (MID Group)1:

A patient whose dd-cfDNA levels decreased then rebounded, correlating with poor outcome



 Rejection Type: TCMR 1B progressing to chronic active TCMR 2



**Outcome:** Developed antibody-mediated rejection (ABMR) 4 months later



**Key takeaway:** A rebound in Prospera<sup>™</sup> dd-cfDNA levels may indicate unresolved injury, despite initial improvement.<sup>1</sup>

### CASE 4 (HIGH Group)1:

A patient with persistently elevated dd-cfDNA and multiple adverse events



- Rejection Type: ABMR
- Serum Creatinine: Increase from 1.5 mg/dL to 5.7 mg/dL



**Outcome:** Graft loss following second rejection biopsy



**Key takeaway:** Persistently elevated Prospera<sup>™</sup> dd-cfDNA may be a strong signal of treatment resistance.<sup>¹</sup>