

Kirielle Singarajah

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- 1 in 4 adults in the US suffer from a diagnosable mental illness
- 1 in 4 of those individuals seek out therapy as a form of treatment
- 1 in 2 individuals do not return for a follow up session

Data Analysis of the Therapist-Client Relationship

Visualizations to unveil, clarify and highlight patterns

Cross-recurrence quantitative analysis (CRQA) to explore and mathematically assess recurrences within the therapist-client system

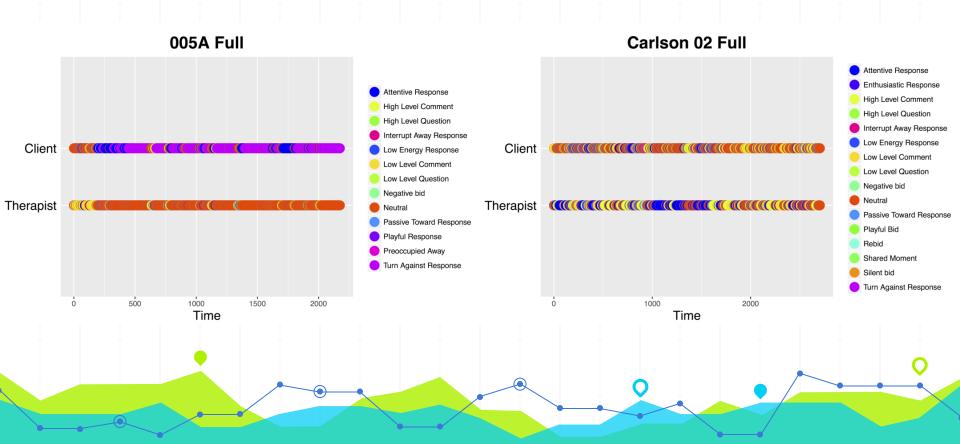
Automation to wrangle (process) data, generate visualizations, and run analytical processes



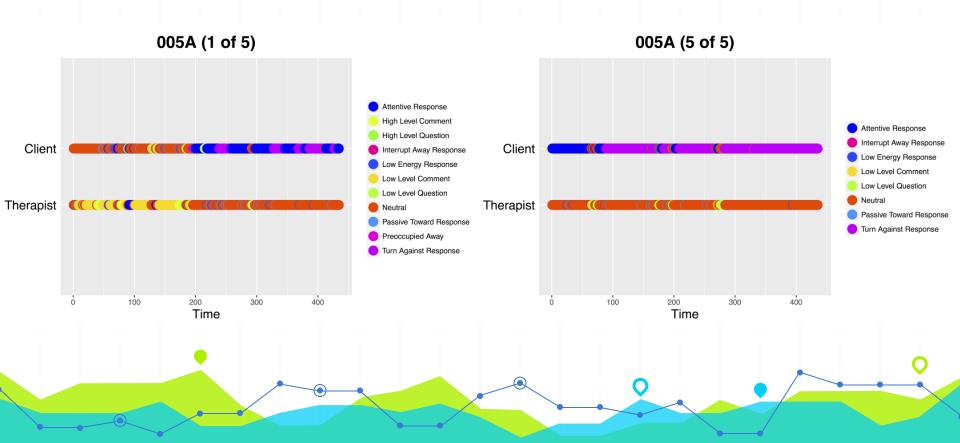




Visualization 1: Coupled Temporal

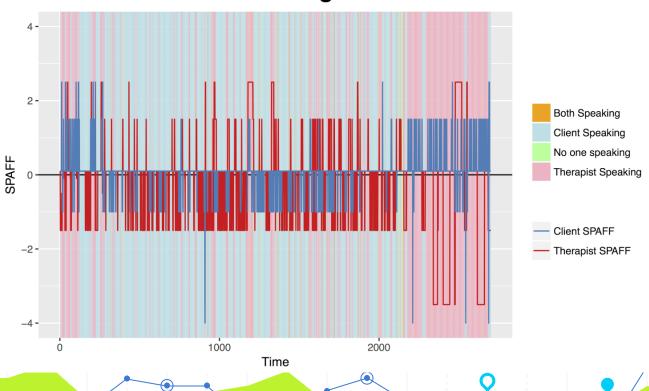


Visualization 1: Coupled Temporal

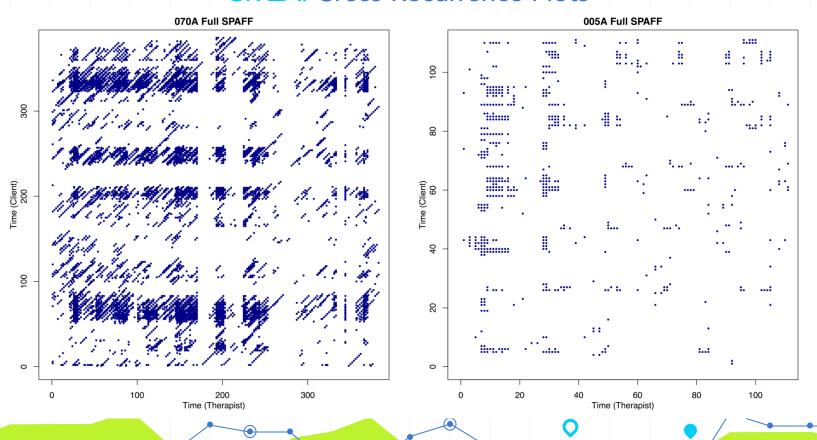


Visualization 2: Overlaid SPAFF + Who Is Talking?

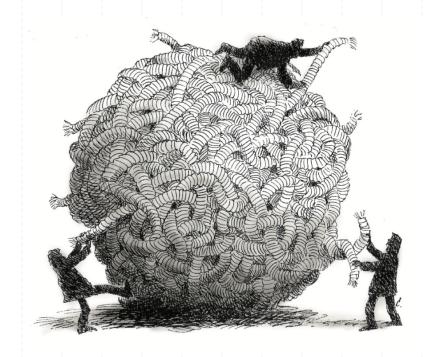
SPAFF-Who Is Talking?: 062A Full

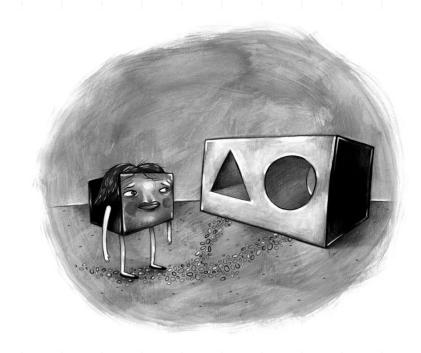


CROA: Cross-Recurrence Plots



Challenges





Moving Forward

Breadth

- More datasets
- More variability
 - Other master therapists
 - Unique cases
- Categorical datasets

Depth

- Machine learning to automate coding of session
- Explore CRQA
 - Other programs
 - Tune or create programs specialized for our data

Thank you!