TECHNOLOGY

Event Category Matrix for Temporal Event Sequences

OVERVIEW

Background
Data analysts have encountered a consistent problem in starting their analyses due to visual complexities. The visual complexity of temporal event sequences in an aggregated view increases with the addition in the number of categories in the dataset. Some existing methods try to solve this problem by automatically simplifying the overview of data. However, this procedure can be rigid and may not allow analysts to fully explore their data.

Innovative Technology
Researchers at the University of Maryland developed a method to simplify the overview of data containing temporal event sequences in the university's EventFlow tool while allowing analysts to more fully explore their data. Building on previous projects Eventflow and Coco, the invention includes a design that allows the analysts to choose two event categories to show for simplifying the overview. Further, the design provides six choices of metrics for choosing which simplified overview to display. For expert analysts, the design shows a lower triangular matrix of small EventFlow overviews with all the pairs of event categories. These simplified overviews help both novice and expert analysts to gain insights into the data and discover meaningful temporal relationships.

APPLICATIONS

· Electronic health records
· Sports analytics
· Can be used for any type of data that uses temporal events

ADVANTAGES

· The overview is displayed in a simplified and aggregated way in EventFlow
· Data analysts can easily understand complex temporal event sequences
· Both novice and expert analysts gain powerful insights and discover meaningful temporal relationships

CONTACT INFO

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Additional Information

INSTITUTION

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PATENT STATUS

Pending

LICENSE STATUS

Contact OTC for licensing information

EXTERNAL RESOURCES

- Presentation from HCIL Symposium 2015

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