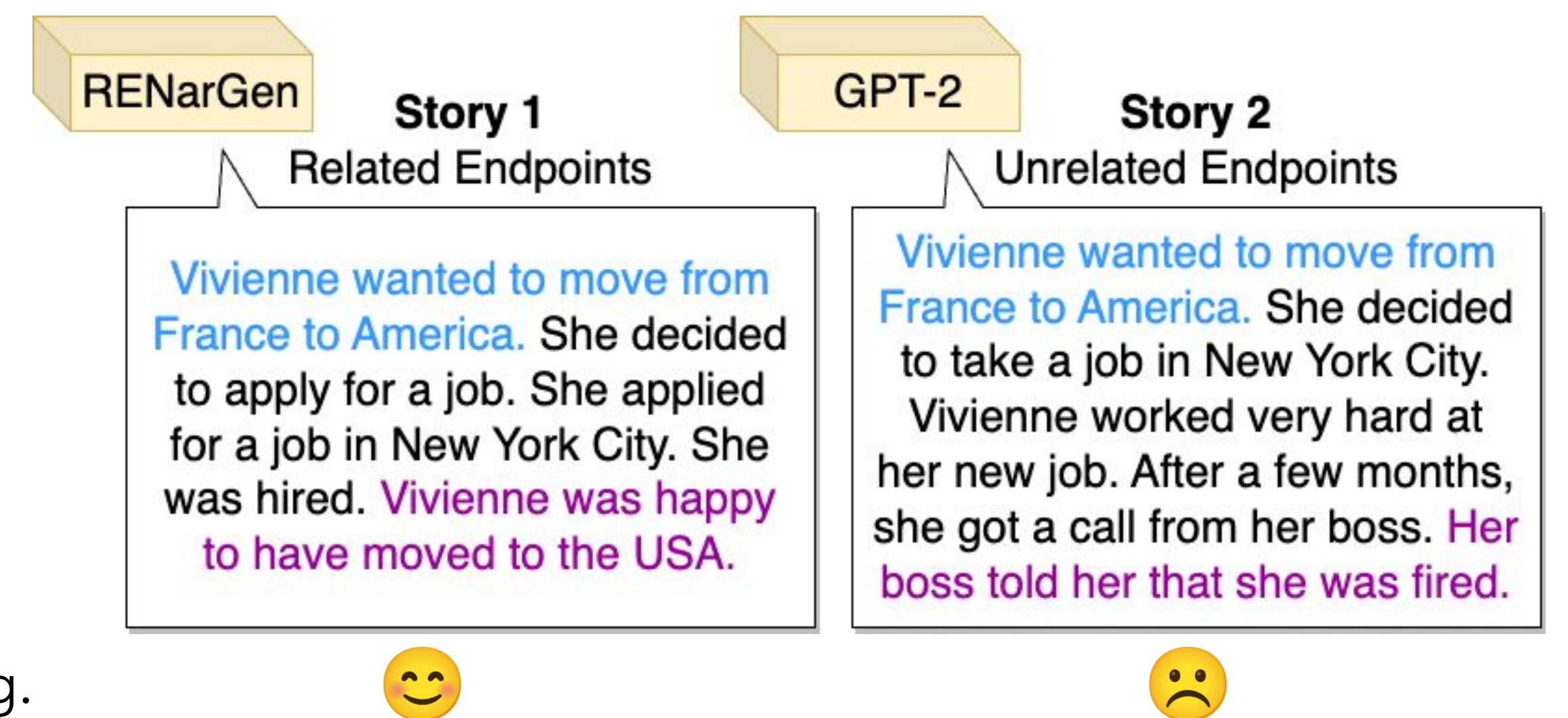# Returning to the Start
Generating Narratives with Related Endpoints

Anneliese Brei[1], Chao Zhao[2], Snigdha Chaturvedi[1]

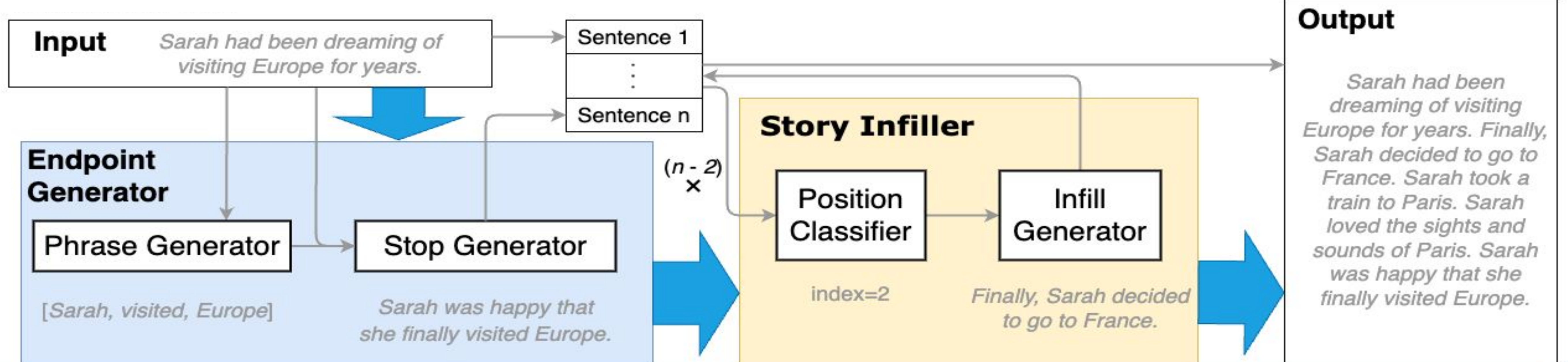{abrei, snigdha}@cs.unc.edu, {zhaochaocs}@gmail.com

[1] Department of Computer Science, UNC Chapel Hill
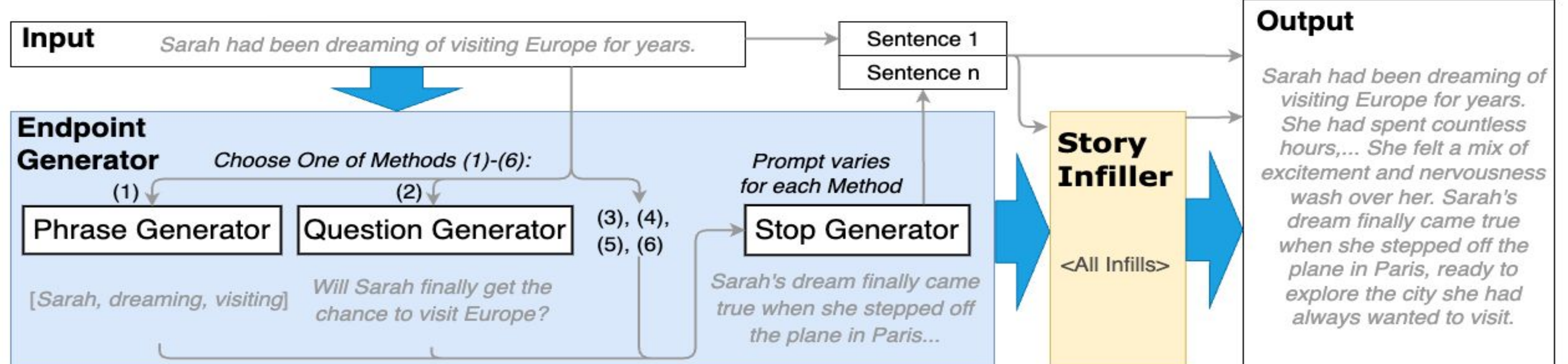[2] Bloomberg

Introduction

- Human writers often bookend their writing to ``close the loop.''
  - Narrative closure: "feeling of finality… when all the questions saliently posed by the narrative are answered." (Carroll, 2007)
- Human writers also expand their stories by adding details via infilling or appending in a left-to-right manner.
- We propose RENarGen, a controllable story-generation paradigm for LMs and LLMs to generate narratives with related first and last sentences.
- This work explores how bookending from Narratology affects language modeling.

RENarGen — Story 1 — Related Endpoints

Vivienne wanted to move from France to America. She decided to apply for a job. She applied for a job in New York City. She was hired. Vivienne was happy to have moved to the USA. 😊

GPT-2 — Story 2 — Unrelated Endpoints

Vivienne wanted to move from France to America. She decided to take a job in New York City. Vivienne worked very hard at her new job. After a few months, she got a call from her boss. Her boss told her that she was fired. ☹

RENarGen for LMs

RENarGen for LLMs

Overview for LMs

- Endpoint generator generates phrase list before generating stop;
- Story infiller dynamically determines position before adding middle sentence.
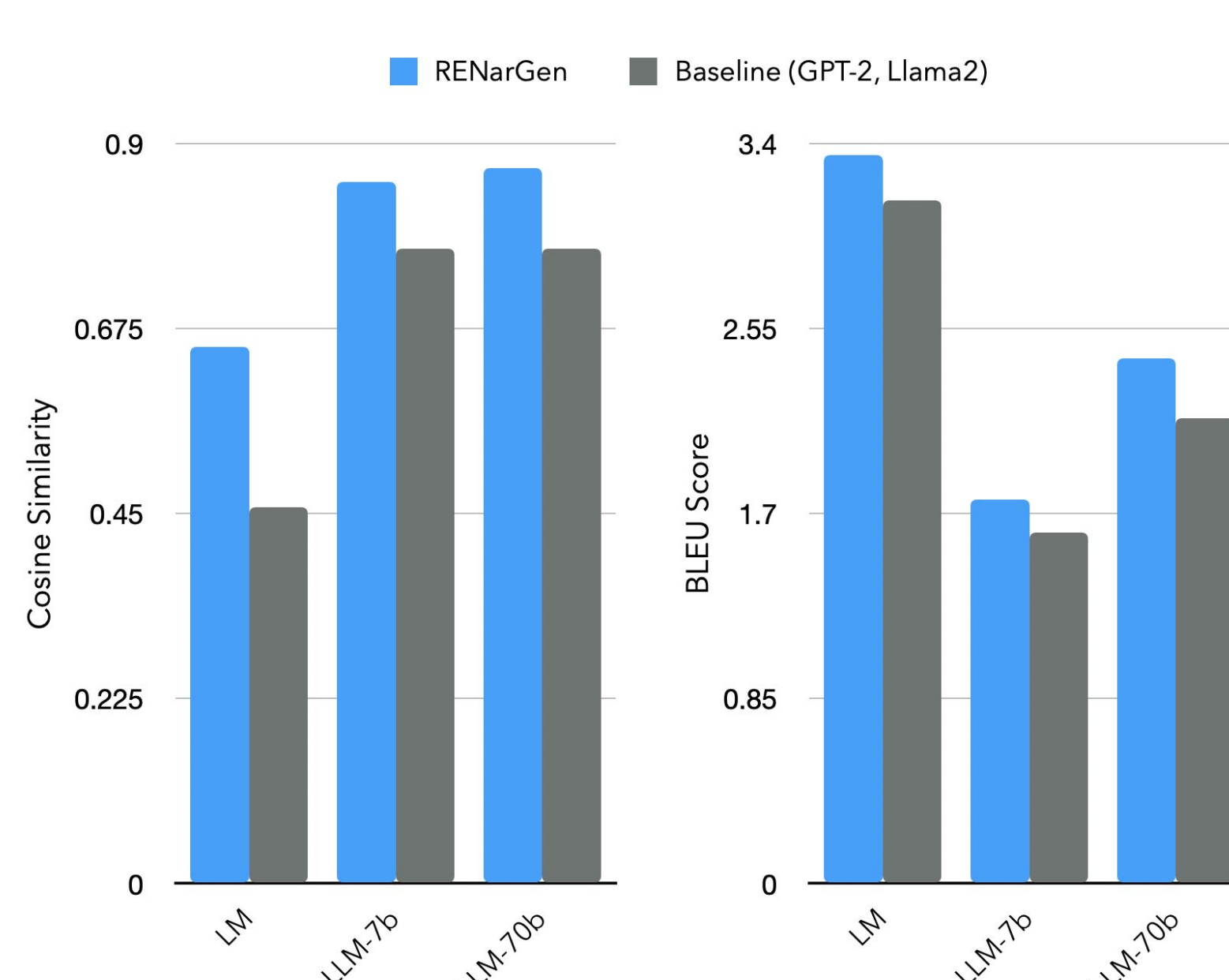
Overview for LLMs

- During inference, 1 of 6 unique methods used to generate related endpoints:
  1. Generate and use a phrase list;
  2. Generate "related stop";
  3. Get salient narrative question introduced by the start and generate stop that answers the question (erotetic definition of story closure);
  4. Generate stop with the same character, action, and/or location as the start ("matching ending");
  5. Generate stop that entails the start;
  6. Generate stop entailed by the start.

- Story infiller generates all middle sentences left-to-right
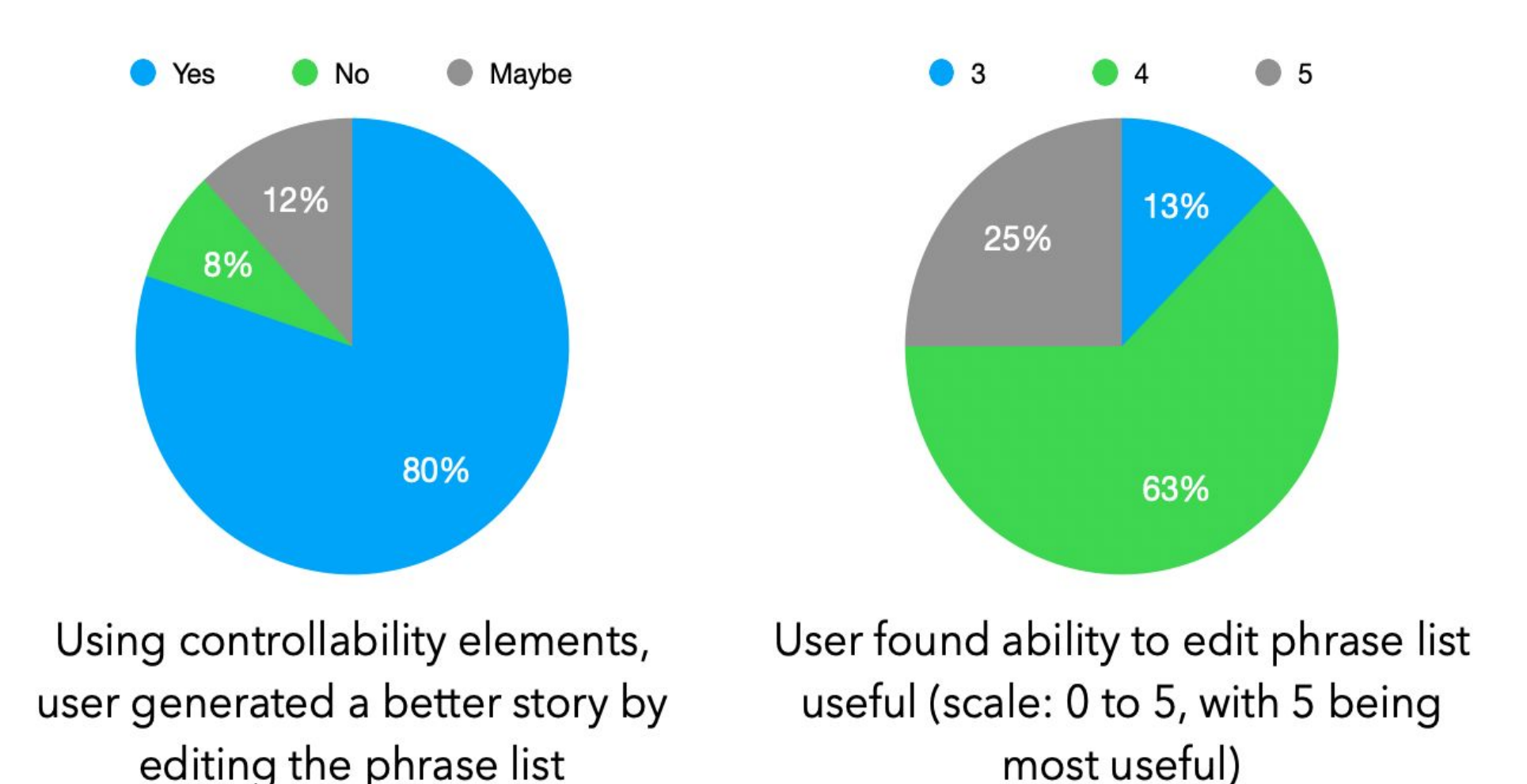
Human Evaluation of Story Generation Quality
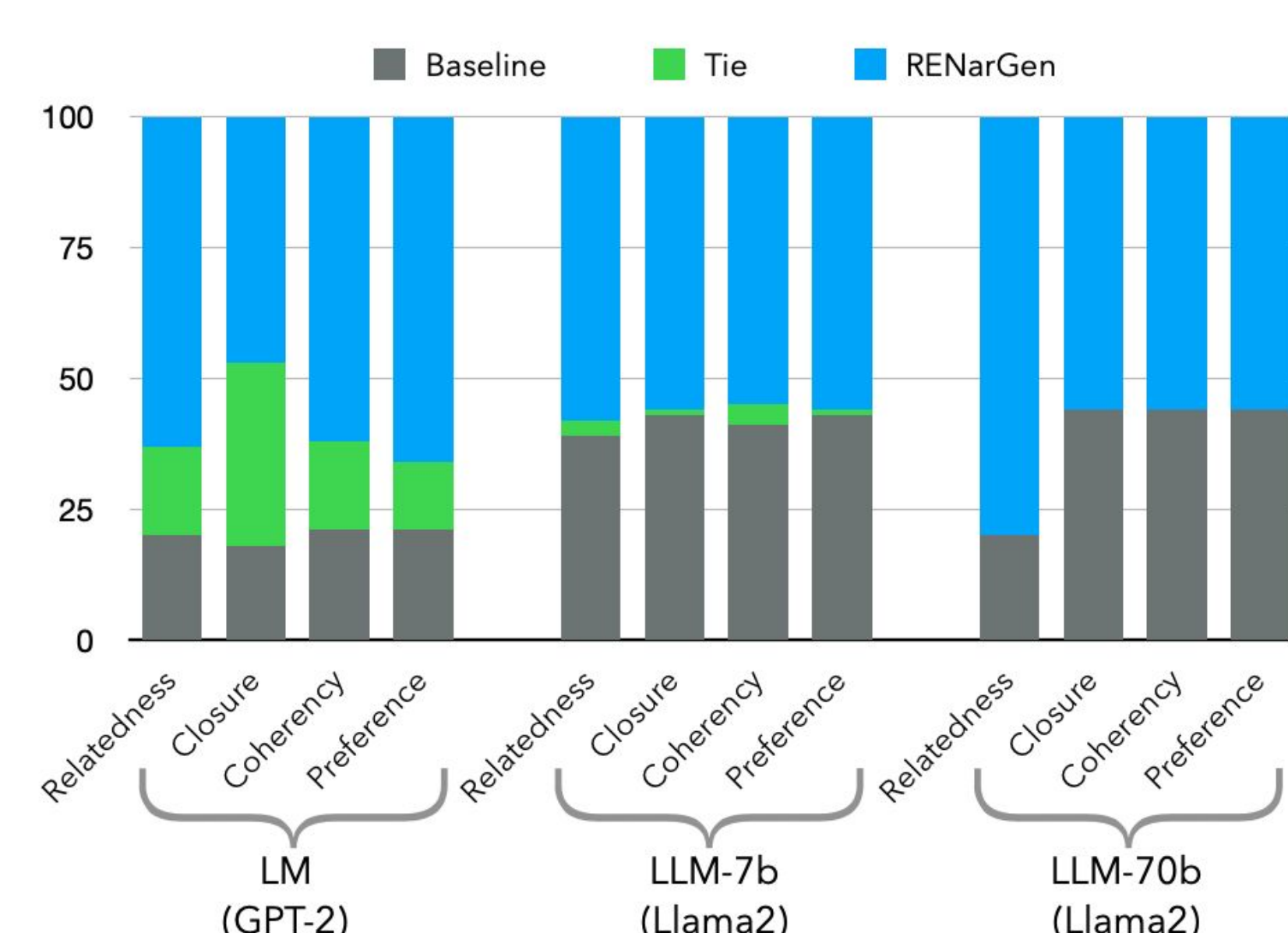
Automatic Evaluation of Story Generation Quality

Human Evaluation of Controllability Features

Using controllability elements, user generated a better story by editing the phrase list

Yes 80%, No 8%, Maybe 12%

User found ability to edit phrase list useful (scale: 0 to 5, with 5 being most useful)

3: 13%, 4: 63%, 5: 25%

Conclusion

- As our paper demonstrates, experiments show applicability of narratology theory for improved narrative generation
- Stories generated with related endpoints are more closed, satisfying, and coherent;
- Human users find RENarGen-LM's controllability useful;
- Link to paper: