

Leveraging AI for Adaptive Narratology in Children's Literature: Enhancing Reader Engagement through Interactive Storytelling

Publisher: IEEE

[Cite This](#)

 PDF

B. Rajasree ; Sashka Jovanovska ; Vigneshwaran Thangaraju ; Reddy Pogu Rajasekar ; Sridhar Maisa ; R Latha Devi [All Authors](#)

5
Full
Text Views



Abstract

Document Sections

- I. Introduction
- II. Literature Review
- III. Materials and Methods
- IV. Results and Discussion
- V. Conclusion and Future Studies

[Authors](#)

[Figures](#)

[References](#)

[Keywords](#)

[Metrics](#)

[More Like This](#)

Abstract:

A vital component of children's development is literature. Children's literature is an effective means of promoting kids' societal, emotional, and mental growth. It helps kids to recognize legal and moral quandaries by seeing the lifestyles, encounters, and moral difficulties of others. Outside the traditional position of passive individuals, interaction elements in visual storytelling encourage people to thoroughly engage with the narrative. Engagement and emotions are two important factors that greatly impact a reader's perspective throughout a reading job. One statistical technique that aids in determining and evaluating an individual's emotions through written material is sentiment evaluation. Various instruments and approaches were used to analyze text data employing artificial intelligence methods to identify mixed emotions. Employing the Random Forest (RF) method, a 5-fold cross-validation method was used to distinguish between optimistic and sad emotions. In the end, the grid-search strategy was used to adjust the hyperparameters, and the outcomes were contrasted with those of five standard methods: AdaBoost, XGBoost, Support Vector Machine (SVM), LSTM, and Naïve Bayes (NB). According to the research results, the suggested framework outperformed all five cutting-edge techniques with corresponding margins of 4.64%, 10.80%, 19.45%, 21.1%, and 56.6 %, achieving an accuracy percentage of 99.64% on the 4000 stories database. It's noteworthy to note that the suggested approach also produced better outcomes in terms of additional traditional efficiency criteria, including temporal complication, recall, precision, and specificity. All things considered, the suggested framework has enormous possibilities for use in academic settings, child psychology studies, and the monitoring of kid-friendly material, typically aiding in the comprehension of kids' emotions and activities in the electronic sphere.

Published in: [2025 7th International Conference on Information Systems and Computer Networks \(ISCON\)](#)

Date of Conference: 05-06 September 2025

DOI: [10.1109/ISCON65210.2025.11341586](#)

Date Added to IEEE Xplore: 23 January 2026

Publisher: IEEE

► ISBN Information:

Conference Location: Mathura, India

[Sign in to Continue Reading](#)

Authors 

Figures 

References 

Keywords 

Metrics 

