

Automatic Multiple Choice Question Generation System for Semantic Attributes Using String Similarity Measures

Ibrahim Eldesoky Fattoh

Teacher Assistant at faculty of Information Technology, MUST University, Cairo, Egypt.

Abstract

This research introduces an automatic multiple choice question generation system to evaluate the understanding of the semantic role labels and named entities in a text. The system provided selects the informative sentence and the keyword to be asked based on the semantic labels and named entities that exist in the sentence, the distractors are chosen based on a similarity measure between sentences in the data set. The system is tested using a set of sentences extracted from the TREC 2007 dataset for question answering. From the experimental results, it can be induced that the semantic role labeling and named entity recognition approaches could be used as a good keyword selection mechanism. The second conclusion is that the string similarity measures proved to be a very good approach that can be used in generating the distractors for an automatic multiple choice question. Also, combining the similarity measures of different algorithms would lead to generate a good distractors.

1. Introduction

Developing Automatic Question Generation (AQG) systems became one of the important research issues because it requires insights from a variety of disciplines, including, Artificial Intelligence (AI), Natural Language Understanding (NLU), and Natural Language Generation (NLG). There are two types of question formats; multiple choice questions which asks about a word in a given sentence, the word may be an adjective, adverb, vocabulary, etc., the second format is the entity questions systems or Text to Text QG that asks about a word or phrase corresponding to a particular entity in a given sentence. In this research the first type of question formats is covered. The traditional multiple-choice question is made up of three components, where the sentence with a gap is defined as the question sentence, the correct choice (removed word) as the key, and the other alternative choices as the distractors [1].

- _____ is the current president of Egypt
(a) H.Mubarak (b) A.EELsisi (c) M.Morsi (d)A.Mansour

The above sentence is an example of multiple choice question, the underline gap represents the word or phrase that is the correct answer, the four choices represent the true answer and three distractors. This research introduces a model for a multiple choice question generator that asks about labels extracted from the given sentence using Semantic Role Labeler (SRL) and entities extracted using Named Entity Recognizer (NER). The distractors generated for the sentence are chosen based on the string similarity between the question sentence and all other sentences in the data set. The rest of the paper is organized as follows: section 2 discusses the related work of Automatic Multiple Choice Questions (AMCQ), section 3 introduces the SRL and NER in brief, section 4 provides the different string text similarity approaches, section 5 introduces the proposed model, and section 6 shows the experimental results and evaluation, and finally section 7 introduces a conclusion and future work with some remarks.

2. Related work

In this section, a review of the previous Automatic Multiple Question Generation systems for the first question type formats mentioned in section 1 is introduced.

Authors in [2] proposed an approach for AQG for vocabulary assessment; they generated 6 types of questions: definition, synonym, antonym, hypernyms, hyponym, and cloze questions. They retrieve the data from WordNet after choosing the correct sense for it. Concerning the distractor choice, the question generation system chooses distractors of the same part of speech and similar frequency to the correct answer. Four of the six computer-generated question types were assessed: the definition, synonym, antonym, and cloze questions. The percentage of questions generated for the four types were above 60% for 156 word list.

The authors of [3] introduced a prototype for an automatic quiz generation system for English text to test learner comprehension of text content and English skills. They used the semantic network to represent the relationship between a vocabulary and its context. They proposed two generators for two types of questions. The first generator is for sense comprehension of adjectives; the generator will extract adjectives from the SemNet of a given text as questionnaire vocabularies and form multiple-choice cloze questions. The right answer is substituted by the synonym or a similar adjective of the applied sense of the questionnaire adjective from WordNet. The second generator is for anaphor comprehension, a learner must integrate these subnets by connecting each anaphor with its antecedents. The generator identifies the antecedent of an anaphor and form a

Automatic Multiple Choice Question Generation System For

**Bunmi S Malau-Aduli, Richard
Hays, Cees P. M. Van Der Vleuten**

Automatic Multiple Choice Question Generation System For:

Discover tales of courage and bravery in Crafted by is empowering ebook, Unleash Courage in **Automatic Multiple Choice Question Generation System For** . In a downloadable PDF format (Download in PDF: *), this collection inspires and motivates. Download now to witness the indomitable spirit of those who dared to be brave.

https://db1.greenfirefarms.com/book/virtual-library/fetch.php/top_method_for_budgeting_tips_online_for_creators.pdf

Table of Contents Automatic Multiple Choice Question Generation System For

1. Understanding the eBook Automatic Multiple Choice Question Generation System For
 - The Rise of Digital Reading Automatic Multiple Choice Question Generation System For
 - Advantages of eBooks Over Traditional Books
2. Identifying Automatic Multiple Choice Question Generation System For
 - Exploring Different Genres
 - Considering Fiction vs. Non-Fiction
 - Determining Your Reading Goals
3. Choosing the Right eBook Platform
 - Popular eBook Platforms
 - Features to Look for in an Automatic Multiple Choice Question Generation System For
 - User-Friendly Interface
4. Exploring eBook Recommendations from Automatic Multiple Choice Question Generation System For
 - Personalized Recommendations
 - Automatic Multiple Choice Question Generation System For User Reviews and Ratings
 - Automatic Multiple Choice Question Generation System For and Bestseller Lists
5. Accessing Automatic Multiple Choice Question Generation System For Free and Paid eBooks
 - Automatic Multiple Choice Question Generation System For Public Domain eBooks
 - Automatic Multiple Choice Question Generation System For eBook Subscription Services
 - Automatic Multiple Choice Question Generation System For Budget-Friendly Options
6. Navigating Automatic Multiple Choice Question Generation System For eBook Formats

- ePub, PDF, MOBI, and More
 - Automatic Multiple Choice Question Generation System For Compatibility with Devices
 - Automatic Multiple Choice Question Generation System For Enhanced eBook Features
7. Enhancing Your Reading Experience
 - Adjustable Fonts and Text Sizes of Automatic Multiple Choice Question Generation System For
 - Highlighting and Note-Taking Automatic Multiple Choice Question Generation System For
 - Interactive Elements Automatic Multiple Choice Question Generation System For
 8. Staying Engaged with Automatic Multiple Choice Question Generation System For
 - Joining Online Reading Communities
 - Participating in Virtual Book Clubs
 - Following Authors and Publishers Automatic Multiple Choice Question Generation System For
 9. Balancing eBooks and Physical Books Automatic Multiple Choice Question Generation System For
 - Benefits of a Digital Library
 - Creating a Diverse Reading Collection Automatic Multiple Choice Question Generation System For
 10. Overcoming Reading Challenges
 - Dealing with Digital Eye Strain
 - Minimizing Distractions
 - Managing Screen Time
 11. Cultivating a Reading Routine Automatic Multiple Choice Question Generation System For
 - Setting Reading Goals Automatic Multiple Choice Question Generation System For
 - Carving Out Dedicated Reading Time
 12. Sourcing Reliable Information of Automatic Multiple Choice Question Generation System For
 - Fact-Checking eBook Content of Automatic Multiple Choice Question Generation System For
 - Distinguishing Credible Sources
 13. Promoting Lifelong Learning
 - Utilizing eBooks for Skill Development
 - Exploring Educational eBooks
 14. Embracing eBook Trends
 - Integration of Multimedia Elements
 - Interactive and Gamified eBooks

Automatic Multiple Choice Question Generation System For Introduction

In this digital age, the convenience of accessing information at our fingertips has become a necessity. Whether its research papers, eBooks, or user manuals, PDF files have become the preferred format for sharing and reading documents. However, the cost associated with purchasing PDF files can sometimes be a barrier for many individuals and organizations. Thankfully, there are numerous websites and platforms that allow users to download free PDF files legally. In this article, we will explore some of the best platforms to download free PDFs. One of the most popular platforms to download free PDF files is Project Gutenberg. This online library offers over 60,000 free eBooks that are in the public domain. From classic literature to historical documents, Project Gutenberg provides a wide range of PDF files that can be downloaded and enjoyed on various devices. The website is user-friendly and allows users to search for specific titles or browse through different categories. Another reliable platform for downloading Automatic Multiple Choice Question Generation System For free PDF files is Open Library. With its vast collection of over 1 million eBooks, Open Library has something for every reader. The website offers a seamless experience by providing options to borrow or download PDF files. Users simply need to create a free account to access this treasure trove of knowledge. Open Library also allows users to contribute by uploading and sharing their own PDF files, making it a collaborative platform for book enthusiasts. For those interested in academic resources, there are websites dedicated to providing free PDFs of research papers and scientific articles. One such website is Academia.edu, which allows researchers and scholars to share their work with a global audience. Users can download PDF files of research papers, theses, and dissertations covering a wide range of subjects. Academia.edu also provides a platform for discussions and networking within the academic community. When it comes to downloading Automatic Multiple Choice Question Generation System For free PDF files of magazines, brochures, and catalogs, Issuu is a popular choice. This digital publishing platform hosts a vast collection of publications from around the world. Users can search for specific titles or explore various categories and genres. Issuu offers a seamless reading experience with its user-friendly interface and allows users to download PDF files for offline reading. Apart from dedicated platforms, search engines also play a crucial role in finding free PDF files. Google, for instance, has an advanced search feature that allows users to filter results by file type. By specifying the file type as "PDF," users can find websites that offer free PDF downloads on a specific topic. While downloading Automatic Multiple Choice Question Generation System For free PDF files is convenient, its important to note that copyright laws must be respected. Always ensure that the PDF files you download are legally available for free. Many authors and publishers voluntarily provide free PDF versions of their work, but its essential to be cautious and verify the authenticity of the source before downloading Automatic Multiple Choice Question Generation System For. In conclusion, the internet offers numerous platforms and websites that allow users to download free PDF files legally. Whether its classic literature, research papers, or magazines, there is something for everyone. The platforms mentioned in this article, such as Project Gutenberg,

Open Library, Academia.edu, and Issuu, provide access to a vast collection of PDF files. However, users should always be cautious and verify the legality of the source before downloading Automatic Multiple Choice Question Generation System For any PDF files. With these platforms, the world of PDF downloads is just a click away.

FAQs About Automatic Multiple Choice Question Generation System For Books

1. Where can I buy Automatic Multiple Choice Question Generation System For books? Bookstores: Physical bookstores like Barnes & Noble, Waterstones, and independent local stores. Online Retailers: Amazon, Book Depository, and various online bookstores offer a wide range of books in physical and digital formats.
2. What are the different book formats available? Hardcover: Sturdy and durable, usually more expensive. Paperback: Cheaper, lighter, and more portable than hardcovers. E-books: Digital books available for e-readers like Kindle or software like Apple Books, Kindle, and Google Play Books.
3. How do I choose a Automatic Multiple Choice Question Generation System For book to read? Genres: Consider the genre you enjoy (fiction, non-fiction, mystery, sci-fi, etc.). Recommendations: Ask friends, join book clubs, or explore online reviews and recommendations. Author: If you like a particular author, you might enjoy more of their work.
4. How do I take care of Automatic Multiple Choice Question Generation System For books? Storage: Keep them away from direct sunlight and in a dry environment. Handling: Avoid folding pages, use bookmarks, and handle them with clean hands. Cleaning: Gently dust the covers and pages occasionally.
5. Can I borrow books without buying them? Public Libraries: Local libraries offer a wide range of books for borrowing. Book Swaps: Community book exchanges or online platforms where people exchange books.
6. How can I track my reading progress or manage my book collection? Book Tracking Apps: Goodreads, LibraryThing, and Book Catalogue are popular apps for tracking your reading progress and managing book collections. Spreadsheets: You can create your own spreadsheet to track books read, ratings, and other details.
7. What are Automatic Multiple Choice Question Generation System For audiobooks, and where can I find them? Audiobooks: Audio recordings of books, perfect for listening while commuting or multitasking. Platforms: Audible, LibriVox, and Google Play Books offer a wide selection of audiobooks.
8. How do I support authors or the book industry? Buy Books: Purchase books from authors or independent bookstores. Reviews: Leave reviews on platforms like Goodreads or Amazon. Promotion: Share your favorite books on social media or recommend them to friends.

9. Are there book clubs or reading communities I can join? Local Clubs: Check for local book clubs in libraries or community centers. Online Communities: Platforms like Goodreads have virtual book clubs and discussion groups.
10. Can I read Automatic Multiple Choice Question Generation System For books for free? Public Domain Books: Many classic books are available for free as they're in the public domain. Free E-books: Some websites offer free e-books legally, like Project Gutenberg or Open Library.

Find Automatic Multiple Choice Question Generation System For :

top method for budgeting tips online for creators

best side hustles 2025 28379 67043 105707

best way to capsule wardrobe guide for experts

best way to blog post ideas step plan

ultimate us national parks for creators for creators

why keyword research guide 25793 64457 103121

simple index fund investing for creators for workers

simple keyword research ideas 10622 49286 87950

simple digital nomad visa 32028 70692 109356

top method for content marketing strategy for students for workers

beginner friendly affiliate marketing full tutorial for experts

top anti-inflammatory diet 10968 49632 88296

what is side hustles full tutorial for students

how to use keyword research for beginners for creators

ultimate ai seo tools for small business for creators

Automatic Multiple Choice Question Generation System For :

Singer Machine Manuals Find the Manual for your Sewing Machine, Embroidery Machine, Serger/Overlock, Quilting Machine, and More. Singer 2818 Manuals Manuals and User Guides for Singer 2818. We have 4 Singer 2818 manuals available for free PDF download: Service Manual, Manual, Instruction Book · English. 6. Support Printed manuals are no longer available. For easy access, please enter your model number to view and download your manual. Don't know your model number? Singer 2818 Instruction Manual We've got you covered! This instruction manual is the ultimate guide to

unlock the full potential of your Singer 2818. No more confusion or frustration—just ... SINGER® Instruction Manuals for Sewing Machines and ... Find comprehensive instruction manuals for SINGER® range of new & old sewing machines, appliances & accessories. Get the guidance you need for seamless ... Singer Sewing Machine Manuals Singer's Sewing Skills Reference Book (28 MB); Singer's Reference Book for Sewing Skills. Information on your machine, its attachments, and how to use them. Singer 2802 2808 2818 Instruction Manuals or Service & ... Service manual and Parts / Schematics for Singer 2852, 2858, 2868. 2 PDF files: HIGHEST QUALITY CLEAR COPIES of original Singer Service / Repair manual (114 ... Over 350 Free Industrial Sewing Machine Manuals Over 350 Free Industrial Sewing Machine Manuals. Link to Singer domestic machine instruction books - FREE downloads User manual Singer SIMPLE (English - 62 pages) Manual. View the manual for the Singer SIMPLE here, for free. This manual comes under the category sewing machines and has been rated by 30 people with an ... HOW TO DOWNLOAD FREE SINGER SEWING MACHINE ... Answer Key Vocabulary Power Grade 6 Pdf (Download Only) Page 6. Answer Key Vocabulary Power Grade 6 Pdf - Pages :6/6. Answer Key Vocabulary Power Grade 6 Pdf upload Arnold j. Paterson. 6/6. Downloaded from status ... Vocabulary Power Workbook g6 | PDF | Idiom Vocabulary Power Workbook g6 - Free download as PDF File (.pdf), Text File (.txt) or read online for free. vocabulary workbook for grade six. Level 6 - VocabularyPowerPlus.com Level 6. for Higher Achievement. Prepare for the Common Core PARCC and Smarter Balanced assessments as well as the SAT and ACT. Lesson 1. Answer Key Vocabulary Power Grade 6 Pdf Answer Key Vocabulary Power Grade 6 Pdf. INTRODUCTION Answer Key Vocabulary Power Grade 6 Pdf (PDF) Vocabulary Workbooks (Grades 6-12) Vocabulary Workbooks (Grades 6-12). Glencoe MacGraw Hill Vocabulary Power (Grade 6-12) (Key Stage 3-4). Vocabulary Workbook ~ Grade 6 · Vocabulary Workbook ... Vocabulary Power Grade 6 Lesson 1 Flashcards Study with Quizlet and memorize flashcards containing terms like alarm, anticipation, bewilderment and more. Vocabulary Power Workbook, Grade 6, Teacher Annotated ... Vocabulary Power Workbook, Grade 6, Teacher Annotated Edition [McGraw-Hill Education] on Amazon.com. *FREE* shipping on qualifying offers. Vocabulary Power ... Vocabulary Power Plus - Level 6 Set Help your students build a powerful vocabulary and prepare your students for the SAT, ACT, and Common Core assessments with Vocabulary Power Plus. Designed to ... Vocabulary Power Workbook, Grade 6, Teacher Annotated ... Vocabulary Power Workbook, Grade 6, Teacher Annotated Edition by McGraw-Hill Education - ISBN 10: 0078262259 - ISBN 13: 9780078262258 - Schools - 2001 ... Calle de las Tiendas Oscuras (Spanish Edition) Calle de las tiendas oscuras, de Patrick Modiano, no es una novela para todo el mundo. La leímos en un taller de escritura por la particularidad del estilo del ... Calle de las Tiendas Oscuras - Modiano, Patrick «Investigación policial, evocación impresionista de los años cuarenta, ensoñación literaria sobre la memoria y la imaginación... Las tiendas oscuras del ... CALLE DE LAS TIENDAS OSCURAS | PATRICK MODIANO Paso a paso Guy Roland va a reconstruir su historia incierta, cuyas piezas se dispersan por Bora Bora, Nueva York, Vichy o Roma, y cuyos testigos habitan un ... Calle de las Tiendas Oscuras (Spanish Edition) Calle de las tiendas

oscuros, de Patrick Modiano, no es una novela para todo el mundo. La leímos en un taller de escritura por la particularidad del estilo del ... Calle de las Tiendas Oscuras - Modiano, Patrick Una novela que nos sitúa ante un yo evanescente, un espectro que trata de volverse corpóreo en un viaje de retorno a un tiempo olvidado. Pero esta búsqueda ... Calle de las Tiendas Oscuras - Club virtual de lectura Le cuenta la historia de un griego de Alejandría que fue asesinado en la misma casa donde ella vivía. El griego era homosexual y subía muchos chicos a casa. Historia de la literatura: "Calle de las tiendas oscuras" May 14, 2023 — La novela de Patrick Modiano, retrata algunos aspectos de la historia de Europa en la época de la Segunda Guerra Mundial. Calle de las Tiendas Oscuras / Missing Person Guy Roland es un hombre sin pasado y sin memoria. Ha trabajado durante ocho años en la agencia de detectives del barón Constantin von Hutte, Calle de las Tiendas Oscuras - Editorial Océano Paso a paso Guy Roland va a reconstruir su historia incierta, cuyas piezas se dispersan por Bora Bora, Nueva York, Vichy o Roma, y cuyos testigos habitan un ... CALLE DE LAS TIENDAS OSCURAS - MODIANO PATRICK Novela con tintes psicológicos. El protagonista es un hombre que sufre amnesia y va buscando su identidad en una aventura del tipo "odisea", donde va conociendo ...