CLAIMS

1. A method of providing recommendations, comprising:

receiving a query at a first platform for e-commerce or shopping from a user;

conducting a trend analysis based on the query;

generating one or more recommendations based on the results of the trend analysis; and

providing the one or more recommendations to the user via the first platform;

wherein the method of providing recommendations further comprises using an image search model which comprises:

receiving an image which comprises one or more objects;

identifying one or more bounding boxes around each of the one or more objects in the image using an object detection algorithm;

extracting features from each of the one or more objects within the identified bounding boxes;

embedding the extracted features into feature vectors using an image embedding model, wherein the image embedding model converts each of the extracted feature into a high-dimensional vector representation;

comparing the feature vectors of the image and a reference image to identify the one or more objects; and

fine-tuning the image embedding model using a Bidirectional Encoder Representations from Transformers (BERT) model approach for semantic understanding, wherein the BERT model is used to capture contextual relationships between the extracted features.

2. The method of claim 1, wherein the query is received in the form of textual input by the user.

3. The method of claim 2, further comprising:

receiving the query from the user;

analyzing the query; and

classifying an intent of the query as general or specific based on the analysis;

wherein if the query is determined to be a general query, the method further comprises forwarding the query to a second platform to find trending items in the second platform.

4. The method of any of claims 1-3, wherein the step of conducting a trend analysis based on the query further comprises:

sending the query to a second platform;

retrieving a plurality of videos from the second platform based on the query;

identifying at least one trending item from the plurality of videos;

generating a plurality of products from the first platform by matching with the at least one trending item identified in the second platform; and

recommending the plurality of products to the user via the first platform.

5. The method of claim 4, further comprising:

taking screenshots at different timepoints of the plurality of videos;

identifying one or more items in the screenshots using the image search model;

determining similarity between the identified one or more items;

selecting items with the highest similarity scores as the at least one trending item from the second platform;

matching products of the first platform with the at least one trending item from the second platform; and

determining the one or more recommendations based on the matched products of the first platform.

6. The method of any of claims 1-5, further comprising:

tracking queries submitted by users over a predetermined period;

identifying a plurality of search queries based on frequency of submission during the predetermined period;

performing searches and retrieving video results for the identified search queries in a second platform;

identifying trending items from the retrieved videos; and

prestoring the plurality of search queries and the identified trending items.

7. The method of claim 6, further comprising:

receiving the query from the user; and

matching the query with the plurality of search queries; wherein

if there is a match between the query and the plurality of search queries, accessing the prestored trending items of the corresponding plurality of queries; or

if there is no match between the query and the plurality of queries, processing the query in real-time.

8. The method of any of claims 1-7, further comprising:

identifying multiple trending items related to the query based on the trend analysis; and

displaying the one or more recommendations based on the identified trending items in a balanced manner on the first platform.

9. The method of claim 1, wherein the query is received in the form of the user interacting with a video content.

10. The method of claim 9, wherein the method further comprises:

receiving at least one video frame from the video content;

identifying one or more items using the image search model by processing the at least one video frame;

matching the one or more items to identify one or more products from the first platform;

creating a link for each of the one or more products; and

displaying the link to the user through a user interface within the video content.

11. The method of claim 10, wherein the step of matching the one or more items comprises using image searches to match the one or more items to a product pool in the first platform.

12. The method of claim 10, wherein the step of identifying one or more items further comprises creating a search string based on the identified one or more items.

13. The method of claim 12, wherein the step of matching the one or more items comprises using the search string to search in the first platform.

14. The method of any of claims 10-13, wherein the identified one or more products is different from a product currently promoted in the video content.

15. The method of claims 5 or 10, wherein the step of identifying one or more items using the image search model further comprises:

comparing the extracted features from the image with the reference image to determine similarity;

generating a similarity score that quantifies a degree of the similarity between each of the one or more objects in the image and the reference image; and

determining if the similarity score of the one or more objects is above a threshold value.

16. A system for providing recommendations, the system comprising:

a processor;

a memory in electronic communication with the processor; and

instructions stored in the memory and executable by the processor to cause the system to perform the method of any of claims 1-15.

17. A computer-readable storage medium, on which a computer program is stored, wherein the computer program, when executed in a computer, causes the computer to perform the method of any of claims 1-15.