

# **AI-based      Relationship Identification System**

END TERM REPORT

*by*

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## **Student Declaration**

This is to declare that this report has been written by S. Venkat and Prerit. No part of the report is copied from other sources. All information included from other sources have been duly acknowledged. We aver that if any part of the report is found to be copied, we are shall take full responsibility for it.

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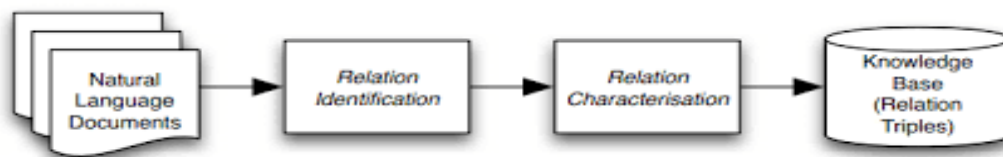
Place-Jalandhar

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## **1 Introduction.**

Relationship identification is a process to find relationships, or connections, between people. Relationships exist only between entity families, between entity groups within entity families, or between specific entity occurrences. It refers to the identification of relevant communications that are indicative of a given relationship type.

We explore the meaning and significance of relational identity and relational identification, predicated on the role-relationship between two individuals. We argue that relational identity integrates person- and role-based identities and thereby the individual, interpersonal, and collective levels of self; contrast relational identity and relational identification with social identity and social identification; contend that relational identity and relational identification are each arranged in a cognitive hierarchy ranging from generalized to particularized schemas; and contrast relational identification with relational disidentification and ambivalent relational identification.



### **1.1 Objectives.**

The following are the objectives of the project of AI-based Relationship Finder: -.

- The basic output of the project is that it should be able to predict out the accurate relationships between 2 members of a family accurately just by considering hey the details of the other members of the family.
- The machine should be able to train itself from the data provided to it.
- Prediction of the relation should be made perfectly.

## **2 Project Description**

when we refer to family identity we talk about the patterns of those dimensions that differentiate the family from other important entities and constitute its unique set of potentials and represent its deep nature.

We will address the topic of family identity at three different levels:

1. at the group level, that is, the specific identity of the family as a group.
2. at the couple subsystem level, in fact, each family subsystem, and especially the couple, has its own identity and, thus, its set of potentials to be pursued.
3. at the individual subsystem level, that is, the component of individual identity that comes from being part of a specific family group.

## **2.1 Assumptions of the project: -**

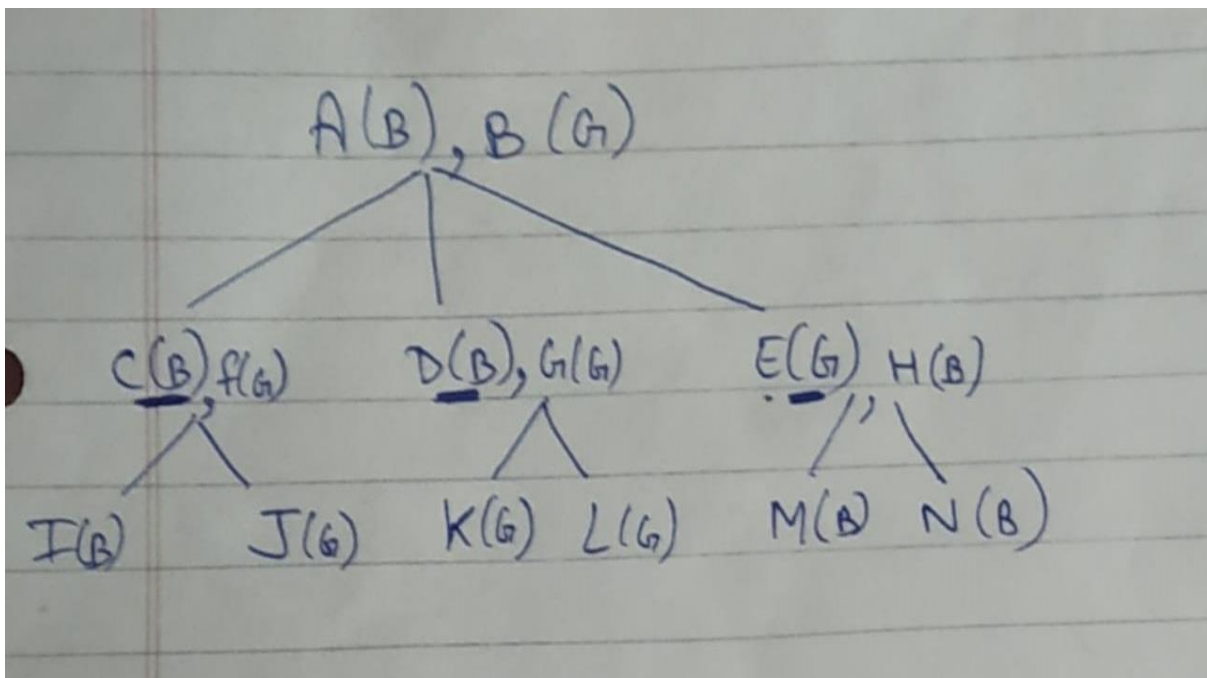
It is a basic assumption-based software. The size of the family is assumed to be constant with two parents A & B. They have three children C(Boy), D(Boy) and E(girl):

Now the following notations are made: -

- F is the wife of C; G is the wife of D and H is the husband of E.
- C and F have children I and J. I is a boy and J is a girl.
- D and G have children K and L. K is a girl and L is a girl.
- E and H have children M and N. M is a boy and N is a boy.

These are the overall assumptions that are made. Changes can be easily made using the "UPDATE" and "DELETE" buttons.

So, all the following assumptions are made a pictorial representation of all the assumptions are shown in the fig 1.



*Figure 1: Pictorial Representation of the assumptions.*

## **2.2 Modules Used:-**

In order to complete the project the following modules are used: -

- Tkinter: - Tkinter is Python's de-facto standard GUI (Graphical User Interface) package. It is a thin object-oriented layer on top of Tcl/Tk.
- Sqlite: - DB Browser for SQLite (DB4S) is a high quality, visual, open source tool to create, design, and edit database files compatible with SQLite.
- Gtts: - Gtts (Google Text-to-Speech), a Python library and CLI tool to interface with Google Translate's text-to-speech API. Writes spoken mp3 data to a file, a file-like object (byte string) for further audio manipulation, or stdout. It features flexible pre-processing and tokenizing, as well as automatic retrieval of supported languages.
- Using the datasets: - NumPy is a Python package which stands for 'Numerical Python'. It is the core library for scientific computing, which contains a powerful n-dimensional array object, provide tools for integrating C, C++ etc. It is also useful in linear algebra, random number capability etc. It is used for predicting out the output from a particular dataset.

## **BONAFIDE CERTIFICATE.**

Certified that this project report “Relation Identification System” is the bona fide work of “Venkat and Prerit Chaudhary” who carried out the project work under my supervision.

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