FORM 2

THE PATENTS ACT, 1970

(39 of 1970)

&

THE PATENTS RULES, 2003

COMPLETE SPECIFICATION

1. **TITLE OF THE INVENTION**

**<<TITLE** EXCEL - PARAPHRASE **>> in Upper CASe**

**2. APPLICANT(S)**

**Name** –

**Nationality** -

**Address** –

**3**. **PREAMBLE TO DESCRIPTION**

COMPLETE SPECIFICATION -The following specification particularly describes the invention and the manner in which it is to be performed.

**<<TITLE** EXCEL - PARAPHRASE **>> in Upper CASe**

# Field of the Invention

1. **<<** **Field of Invention** EXCEL – PARAPHRASE>>

# Background

1. The background description includes information that may be useful in understanding the present invention. It is not an admission that any of the information provided herein is prior art or relevant to the presently claimed invention, or that any publication specifically or implicitly referenced is prior art.
2. **<<background** EXCEL - PARAPHRASE **>>**

# Objects of the Invention

**<<Object** EXCEL - PARAPHRASE **>>**

# Summary

1. **<<Field** EXCEL - PARAPHRASE **>>**
2. **Embodiments of the present disclosure may include a system to determine an emotion state of a user, the system may include a computing device that may be arranged to receive a speech input from the user. Embodiments may also include a communication interface. Embodiments may also include a server arrangement including a non-transitory storage device that may be arranged to store a set of executable routines and a voice database including the multiple speech templates.,In some embodiments, each of the speech template corresponds to an emotion trait. Embodiments may also include a microprocessor which may be coupled to the non-transitory storage device and operable to execute the set of routines to acquire the received speech input and each of the speech template from the computing device and the non-transitory storage device, respectively.,Embodiments may also include extract a first set of acoustic features and a second set of acoustic features from the acquired, speech input and the speech template, respectively. Embodiments may also include generate a mathematical model by utilizing the extracted second set of acoustic features. Embodiments may also include apply the generated mathematical model at the extracted first set of acoustic features to determine the emotion state of the user. Embodiments may also include transmit the determined emotion state to a computing machine.,In some embodiments, the microprocessor applies a machine learning technique for generation of the mathematical model. In some embodiments, the microprocessor determines the personality traits of the user by analyzing the acquired speech input. In some embodiments, the microprocessor determines a unique score for each of the determined personality trait. In some embodiments, the microprocessor predicts a characteristic of the user based on the each determined unique score. In some embodiments, the microprocessor determines a work behavior of the person based on the each determined unique score.,Embodiments of the present disclosure may also include a method to determine an emotion of a human speech, the method may include receiving, at a computing device, a speech input from a user. Embodiments may also include acquiring, at a microprocessor, the received speech input and each of the speech template from the computing device and the non-transitory storage device, respectively.,Embodiments may also include extracting, a first set of acoustic features and a second set of acoustic features from the acquired, speech input and the speech template, respectively. Embodiments may also include generating, a mathematical model by utilizing the extracted second set of acoustic features. Embodiments may also include applying, the generated mathematical model at the extracted first set of acoustic features to determine the emotion state of the user. Embodiments may also include transmitting, the determined emotion state to a computing machine.,In some embodiments, the microprocessor applies a machine learning technique for generation of the mathematical model. In some embodiments, the microprocessor determines the personality traits of the user by analyzing the acquired speech input. In some embodiments, the microprocessor determines a unique score for each of the determined personality trait.**

# Brief Description of the Drawings

1. The features and advantages of the present disclosure would be more clearly understood from the following description taken in conjunction with the accompanying drawings in which:
2. Embodiments of the present disclosure may include a system to determine an emotion state of a user, the system may include a computing device that may be arranged to receive a speech input from the user. Embodiments may also include a communication interface. Embodiments may also include a server arrangement including a non-transitory storage device that may be arranged to store a set of executable routines and a voice database including the multiple speech templates.,In some embodiments, each of the speech template corresponds to an emotion trait. Embodiments may also include a microprocessor which may be coupled to the non-transitory storage device and operable to execute the set of routines to acquire the received speech input and each of the speech template from the computing device and the non-transitory storage device, respectively.,Embodiments may also include extract a first set of acoustic features and a second set of acoustic features from the acquired, speech input and the speech template, respectively. Embodiments may also include generate a mathematical model by utilizing the extracted second set of acoustic features. Embodiments may also include apply the generated mathematical model at the extracted first set of acoustic features to determine the emotion state of the user. Embodiments may also include transmit the determined emotion state to a computing machine.,In some embodiments, the microprocessor applies a machine learning technique for generation of the mathematical model. In some embodiments, the microprocessor determines the personality traits of the user by analyzing the acquired speech input. In some embodiments, the microprocessor determines a unique score for each of the determined personality trait. In some embodiments, the microprocessor predicts a characteristic of the user based on the each determined unique score. In some embodiments, the microprocessor determines a work behavior of the person based on the each determined unique score.,Embodiments of the present disclosure may also include a method to determine an emotion of a human speech, the method may include receiving, at a computing device, a speech input from a user. Embodiments may also include acquiring, at a microprocessor, the received speech input and each of the speech template from the computing device and the non-transitory storage device, respectively.,Embodiments may also include extracting, a first set of acoustic features and a second set of acoustic features from the acquired, speech input and the speech template, respectively. Embodiments may also include generating, a mathematical model by utilizing the extracted second set of acoustic features. Embodiments may also include applying, the generated mathematical model at the extracted first set of acoustic features to determine the emotion state of the user. Embodiments may also include transmitting, the determined emotion state to a computing machine.,In some embodiments, the microprocessor applies a machine learning technique for generation of the mathematical model. In some embodiments, the microprocessor determines the personality traits of the user by analyzing the acquired speech input. In some embodiments, the microprocessor determines a unique score for each of the determined personality trait.

# Detailed Description

1. The following is a detailed description of exemplary embodiments to illustrate the principles of the invention. The embodiments are provided to illustrate aspects of the invention, but the invention is not limited to any embodiment. The scope of the invention encompasses numerous alternatives, modifications and equivalent; it is limited only by the claims.
2. undefined
3. <<Detailed description – EXCEL - PARAPHRASE>>

# Advantages of the Invention

1. An advantage of the present disclosure is to overcome one or more drawbacks associated with conventional mechanisms.
2. <<ADVANTAGES based on Objects>>

# Claims

I/We claims:

1. <<CLAIMS EXCEL Raw Sheet>>

**<<TITLE – PARAPHRASE>> in Upper case**

# Abstract

Embodiments of the present disclosure may include a system to determine an emotion state of a user, the system may include a computing device that may be arranged to receive a speech input from the user. Embodiments may also include a communication interface. Embodiments may also include a server arrangement including a non-transitory storage device that may be arranged to store a set of executable routines and a voice database including the multiple speech templates. In some embodiments, each of the speech template corresponds to an emotion trait. Embodiments may also include a microprocessor which may be coupled to the non-transitory storage device and operable to execute the set of routines to acquire the received speech input and each of the speech template from the computing device and the non-transitory storage device, respectively.

Fig. 1

# Drawings

<<Drawing Patent Pal>>