

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

**PROVISIONAL APPLICATION FOR LETTERS PATENT**

For

**Logical Phonetic Alphabet**

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### **FIELD OF THE INVENTION**

The field of the invention relates to novel logical phonetic alphabet system.

### **BACKGROUND OF INVENTION**

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The English language, written with the Latin alphabet, is spelled non-phonetically. Many English words have a pronunciation that is distinct from their written form.

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In order to teach proper pronunciation of English, Phonetic alphabets have been developed. These alphabets are visual systems of phonemes, or sounds that occur in spoken English.

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The International Phonetic Alphabet (IPA) is one such alphabet. The International Phonetic Alphabet (IPA) is based on the Latin alphabet. The IPA usually provides one symbol for each distinctive sound of the English language. Since the IPA symbols are meant to harmonize with the Latin alphabet, most IPA symbols are either Latin or Greek letters, or modifications thereof.

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However, the International Phonetic Alphabet may be confusing to many users. It is not a logically based system of phonemes. For example, the IPA uses the word and sounds of "bet" to represent the English word "bait" as used in connection with a lure such as a worm, not "bet" as used connection with a wager in gambling. Furthermore, the IPA uses the word and sounds of "bait" to represent the English word "bite" as used in connection with gripping with teeth.

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Accordingly, a need exists for an improved system of teaching of reading, writing and pronouncing English.

### **BRIEF DESCRIPTION OF THE DRAWINGS**

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Advantages of the present invention will be apparent from the following detailed description of exemplary embodiments thereof, which description should be considered in conjunction with the accompanying drawings:

10 Figure 1A illustrates a first set of visual image components of the symbols of the phonetic alphabet.

Figure 1B illustrates the three vertical and horizontal positions of the tongue.

15 Figure 1C illustrates the combined nine distinct tongue positions.

Figure 1D illustrates the first symbol be.

Figure 2 illustrates the second symbol me.

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Figure 3 illustrates the third symbol purr.

Figure 4 illustrates the fourth symbol yow.

25 Figure 5 illustrates the fifth symbol fee.

Figure 6 illustrates the sixth symbol that.

Figure 7 illustrates the seventh symbol thaw.

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Figure 8 illustrates the eighth symbol dew.

Figure 9 illustrates the ninth symbol new.

Figure 10 illustrates the tenth symbol tea.

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Figure 11 illustrates the eleventh symbol zoo.

Figure 12 illustrates the twelfth symbol sue.

10 Figure 13 illustrates the thirteenth symbol puddle.

Figure 14 illustrates the fourteenth symbol vision.

Figure 15 illustrates the fifteenth symbol shoe.

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Figure 16 illustrates the sixteenth symbol good.

Figure 17 illustrates the seventeenth symbol sing.

20 Figure 18 illustrates the eighteenth symbol key.

Figure 19 illustrates the nineteenth symbol uh-uh.

Figure 20 illustrates the twentieth symbol womb.

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Figure 21 illustrates the twenty-first symbol ooze.

Figure 22 illustrates the twenty-second symbol book.

30 Figure 23 illustrates the twenty-third symbol earth.

Figure 24 illustrates the twenty-fourth symbol love.

Figure 25 illustrates the twenty-fifth symbol year.

5 Figure 26 illustrates the twenty-sixth symbol eat.

Figure 27 illustrates the twenty-seventh symbol it.

Figure 28 illustrates the twenty-eighth symbol or.

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Figure 29 illustrates the twenty-ninth symbol up.

Figure 30 illustrates the thirtieth symbol air.

15 Figure 31 illustrates the thirty-first symbol egg.

Figure 32 illustrates the thirty-second symbol all.

Figure 33 illustrates the thirty-third symbol, on, the low central vowel.

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Figure 34 illustrates the thirty-fourth symbol, ash, the low front vowel.

Figure 35 illustrates the thirty-fifth symbol hoop.

25 Figure 36 illustrates the thirty-sixth symbol hook.

Figure 37 illustrates the thirty-seventh symbol heard.

Figure 38 illustrates the thirty-eighth symbol huge.

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Figure 39 illustrates the thirty-ninth symbol heal.

Figure 40 illustrates the fortieth symbol hill.

Figure 41 illustrates the forty-first symbol home.

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Figure 42 illustrates the forty-second symbol hug.

Figure 43 illustrates the forty-third symbol hair.

10 Figure 44 illustrates the forty-fourth symbol head.

Figure 45 illustrates the forty-fifth symbol hall.

Figure 46 illustrates the forty-sixth symbol hot.

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Figure 47 illustrates the forty-seventh symbol hat.

### **DETAILED DESCRIPTION OF EMBODIMENTS**

20 The following will describe, in detail, several embodiments of the present invention. These embodiments are provided by way of explanation only, and thus, should not unduly restrict the scope of the invention. In fact, those of ordinary skill in the art will appreciate upon reading the present specification and viewing the present drawings that the invention teaches many variations and modifications, and that  
25 numerous variations of the invention may be employed, used and made without departing from the scope and spirit of the invention.

For a conceptual understanding of the invention and its operational advantages, refer to the accompanying drawings and descriptive matter in which there are  
30 preferred embodiments of the invention illustrated. Other features and advantages of the present invention will become apparent from the following description of the

preferred embodiment(s), taken in conjunction with the accompanying drawings, which by way of example; illustrate the principles of the invention.

5 The subject invention is a set of forty-seven (47) symbols, one symbol for each phoneme, or pronounced sound, of the English language. These symbols are logically derived to visually match facial features as the sound is being pronounced.

Besides every symbol's logical relationship to the one sound it represents, the sequence of symbols has a logical sequence as follows: 1) consonants precede vowels; 2) voiced vowels precede voiceless vowels; and 3) consonants pronounced nearest the lips precede those consonants pronounced nearest the throat.

15 As shown in Figure 1A, the symbols are based on a logical system of visual images that match facial features as a sound is being pronounced. The first set of visual images that represent facial features, or articulators, used to produce sound and are components of the symbols are the following: the nose 1, the Upper lip 2, the Lower lip 3, the Upper front teeth 4, the Lower alveolar ridge 5, the Hard palate 6, the Soft palate or tongue tip 7, the Tongue root 8, the Glottis 9 and Voicelessness 10. The first nineteen symbols consist of depictions of the articulators used to produce the sounds.

20 As shown in Figure 1D, the first symbol, be, is the bilabial voiced stop. The word: be has the letter "b" underlined to show which sound the symbol stands for. In this case, it's the initial "bee" sound. This symbol consists of the upper lip component 2 touching the lower lip component 3. This symbol does not feature either the nasal or the voicelessness diacritic. Bilabial means this sound produced by both lips. Stop means the air flow is stopped, then released.

30 As shown in Figure 2, the second symbol, me, is the bilabial voiced nasal. It consists of the same basic symbol of be with the addition of the nasal diacritic above, representing the nose 1, which is above the lips 2 and 3. The air flows through the

nose during the production of this sound. This can be demonstrated by pinching your nose and trying to say the sound: “mmmmmm”.

5 As shown in Figure 3, the third symbol, purr, is the bilabial voiceless stop. It consists of the same basic symbol of be, with the addition of a voicelessness dot 10 below, representing voicelessness of the vocal cords, which are located below the mouth.

10 The English language has three bilabial sounds. Two of these sounds are produced using the lower lip and upper front teeth. Since these two sounds use the lower lip, but not the upper lip, they are the next two sounds in the sequence.

15 As shown in Figure 4, the fourth symbol, yow, is the labio-dental voiced fricative. Labio means lip. Dental means teeth. A fricative is a sound made by the friction of air flowing between articulators. So, in yow, the visual component for the lower lip does not touch the visual component for the upper front teeth.

20 As shown in Figure 5, the fifth symbol, fee, is the labio-dental voiceless fricative. It is identical to yow, except for the addition of the voicelessness dot 10 below it.

25 As shown in Figure 6, the sixth symbol, that, is the apico-dental voiced fricative. Apico means tongue tip. The visual component for the tongue tip is below the visual component for the upper front teeth, without touching it, as the flow of air does not stop when this sound is produced.

30 As shown in Figure 7, the seventh symbol, thaw, is the apico-dental voiceless fricative. It is identical to the symbol that, except for the addition of the voicelessness dot 10 below it.

30 The next five symbols incorporate the visual components of the tongue tip 7 and the alveolar ridge 5 behind the upper front teeth 4.



As shown in Figure 8, the eighth symbol, dew, is the apico-alveolar voiced stop. It involves the tongue tip 7 touching the alveolar ridge 5.

- 5 As shown in Figure 9, the ninth symbol, new, is the apico-alveolar nasal. It is identical to the symbol dew, except for the nasal diacritic above it, meaning the air flows through the nose when this sound is produced.

10 As shown in Figure 10, the tenth symbol, tea, is the apico-alveolar voiceless stop. It is identical to the symbol dew, except for the voicelessness diacritic below it, meaning the vocal cords do not vibrate when this sound is produced.

15 As shown in Figure 11, the eleventh symbol, zoo, is the apico-alveolar voiced fricative. It is identical to the symbol dew, except for a gap between the tongue tip 7 and alveolar ridge 5, meaning the air flow does not stop when this sound is produced.

20 As shown in Figure 12, the twelfth symbol, sue, is the apico-alveolar voiceless fricative. It is identical to the symbol zoo, except for the voicelessness diacritic below it, meaning the vocal cords do not vibrate when this sound is produced.

25 As shown in Figure 13, the thirteenth symbol, puddle, is the apico-palatal voiced stop. It consists of the tongue tip 7 touching the hard palate 6. It only occurs in the middle of a pronounced word.

30 As shown in Figure 14, the fourteenth symbol, vision, is the apico-palatal voiced fricative. It is identical to the symbol puddle, except for a gap between the tongue tip 7 and hard palate 6, meaning the air flow does not stop when this sound is produced.

As shown in Figure 15, the fifteenth symbol, shoe, is the apico-alveolar voiceless

fricative. It is identical to the symbol viʒion, except for the voicelessness diacritic below it, meaning the vocal cords do not vibrate when this sound is produced.

As shown in Figure 16, the sixteenth symbol, good, is the dorso-velar voiced stop.  
5 Dorso means tongue root. Velar means soft palate. This symbol consists of the tongue root 8 touching the soft palate 7.

As shown in Figure 17, the seventeenth symbol, sing, is the dorso-velar nasal. It is identical to the symbol good, except for the nasal diacritic above it, meaning the air  
10 flows through the nose when this sound is produced.

As shown in Figure 18, the eighteenth symbol, key, is the dorso-velar voiceless stop. It is identical to good, except for the voicelessness diacritic below it, meaning the vocal cords don't vibrate when this sound is produced.

15 As shown in Figure 19, the nineteenth symbol, uh-uh, is the glottal voiced stop. It consists of the vocal cords touching each other when this sound is produced.

All of the remaining symbols are based on the position of the tongue, in two  
20 dimensions: vertical and horizontal, as shown in Figures 1B and 1C. Each dimension is divided into three regions. As shown in Chart 11, the three vertical positions of the tongue are high, middle, and low. As shown in Chart 12, the three horizontal positions of the tongue are front, central, and back. The combination of Charts 11 and 12 to form Chart 13, as shown in Figure 1C, forms nine distinct tongue  
25 positions, such as "HB" for High Back, "HC" for High Center, "HF" for High Front, "MB" for Middle Back, "MC" for Middle Center, "MF" for Middle Front, "LB" for Low Back, "LC" for Low Center, "LF" for Low Front. The tic-tac-toe board diagram 14 represents these nine regions of Chart 13. Diagram 14 also resembles a telephone keypad.

30 As shown in Figure 20, the twentieth symbol, womb, is the high back approximant.

An approximant is a speech sound produced by narrowing but not blocking the vocal tract, as by placing an articulator, such as the tongue, near another part of the vocal tract. In this case, the back of the tongue is near the back of the mouth, while the lips are rounded. A C-shaped diacritic to the right of the basic symbol means the lips are rounded, or puckered when this sound is produced.

As shown in Figure 21, the twenty-first symbol, ooze, is the high back cardinal vowel. A cardinal vowel is a primary, sustained vowel sound that constitutes a reference for describing the vowel inventory of a language.

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As shown in Figure 22, the twenty-second symbol, book, is the high back non-cardinal vowel. Its precise position is next to the intersection of the two line segments that comprise the symbol. So, just as these line segments define the vowel as high and back, the smaller segments pinpoint the sound as less high and less back than its cardinal counterpart.

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As shown in Figure 23, the twenty-third symbol, earth, is the high central cardinal approximant. Raising the tongue so both sides touch, but not the center produces this sound.

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As shown in Figure 24, the twenty-fourth symbol, love, is the high central non-cardinal approximant. Raising the tip of the tongue to touch the alveolar ridge, but letting air flow laterally around the sides of the tongue produces this sound.

25 As shown in Figure 25, the twenty-fifth symbol, year, is the high front approximant. In this case, the tip of the tongue is almost touching the alveolar ridge. The lips are unrounded, as if smiling, so a wedge-shaped diacritic is placed to the right of the basic symbol, resembling the shape of the mouth when this sound is produced.

30 As shown in Figure 26, the twenty-sixth symbol, eat, is the high front cardinal vowel. Its precise location is in the top right corner of the tic-tac-toe board.

As shown in Figure 27, the twenty-seventh symbol, i, is the high front non-cardinal vowel. Its precise location is near the intersection of the two line segments, which comprise the basic symbol. That means it is not as high or as front as its cardinal counterpart.

As shown in Figure 28, the twenty-eighth symbol, o, is the mid back vowel. There is only one mid back vowel in English.

As shown in Figure 29, the twenty-ninth symbol, u, is the mid central vowel. It is the schwa. There is only one mid central vowel in English.

As shown in Figure 30, the thirtieth symbol, a, is the mid front cardinal vowel. Its precise location is slightly higher than its non-cardinal counterpart.

As shown in Figure 31, the thirty-first symbol, e, is the mid front non-cardinal vowel. Its precise location is slightly lower than its cardinal counterpart.

As shown in Figure 32, the thirty-second symbol, ɑ, is the low back vowel. There is only one low back vowel in English.

As shown in Figure 33, the thirty-third symbol, ɒ, is the low central vowel. There is only one low central vowel in English.

As shown in Figure 34, the thirty-fourth symbol, æ, is the low front vowel. There is only one low front vowel in English.

The remaining symbols represent voiceless vowels. Their voiced counterparts always immediately follow them.

As shown in Figure 35, the thirty-fifth symbol, ɔ, is the high back cardinal

voiceless vowel. Its precise location is in the upper left corner of the tic-tac-toe board. It is identical to the symbol ooze, except for the voicelessness diacritic below it.

5 As shown in Figure 36, the thirty-sixth symbol, hook, is the high back non-cardinal voiceless vowel. Its precise location is slightly lower and less back than its cardinal counterpart. It is identical to the symbol book, except for the voicelessness diacritic below it.

10 As shown in Figure 37, the thirty-seventh symbol, heard, is the high central voiceless approximant. It is the only high central voiceless approximant. It is identical to the symbol earth, except for the voicelessness diacritic below it.

As shown in Figure 38, the thirty-eighth symbol, huge, is the high front voiceless  
15 approximant. It is identical to the symbol year, except for the voicelessness diacritic below it.

As shown in Figure 39, the thirty-ninth symbol, heal, is the high front cardinal  
20 voiceless vowel. Its precise location is in the upper right corner of the tic-tac-toe board. It is identical to the symbol eat, except for the voicelessness diacritic below it.

As shown in Figure 40, the fortieth symbol, hill, is the high front non-cardinal  
25 voiceless vowel. Its precise location is slightly lower and less front than eat. It is identical to the symbol it, except for the voicelessness diacritic below it.

As shown in Figure 41, the forty-first symbol, home, is the mid back voiceless vowel.  
It is the only mid back voiceless vowel. It is identical to the symbol or, except for the  
voicelessness diacritic below it.

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As shown in Figure 42, the forty-second symbol, hug, is the mid central voiceless

vowel. It is the only mid central voiceless vowel. It is identical to the symbol ɹ, except for the voicelessness diacritic below it.

5 As shown in Figure 43, the forty-third symbol, hair, is the mid front cardinal voiceless vowel. Its precise location is slightly higher than its non-cardinal counterpart. It is identical to the symbol ɹ, except for the voicelessness diacritic below it.

10 As shown in Figure 44, the forty-fourth symbol, head, is the mid front non-cardinal voiceless vowel. Its precise location is slightly lower than its cardinal, counterpart. It is identical to the symbol ɹ, except for the voicelessness diacritic below it.

15 As shown in Figure 45, the forty-fifth symbol, hall, is the low back voiceless vowel. It is the only low back voiceless vowel. It is identical to the symbol ɹ, except for the voicelessness diacritic below it.

20 As shown in Figure 46, the forty-sixth symbol, hot, is the low central voiceless vowel. It is the only low central voiceless vowel. It is identical to the symbol ɹ, except for the voicelessness diacritic below it.

As shown in Figure 47, the forty-seventh symbol, hat, is the low front voiceless vowel. It is the only low front voiceless vowel. It is identical to the symbol ɹ, except for the voicelessness diacritic below it.

25 An affricate is a cluster of two consonants, a stop followed by a fricative. For example, the symbol, ɹew, followed by the symbol ʃion is used to depict the initial and final sounds of the word “judge”. Likewise, the symbol, ʃea, followed by the symbol, hoe, is used to depict the initial and final sounds of the word “church”. The former is the voiced twin of the latter.

30 A diphthong is a monosyllabic vowel combination involving a quick but smooth

movement from one vowel to another. For example, the symbol, air, followed by the symbol, eat, is used to depict the final sounds of the word “say”. Also, the symbol, or, followed by the symbol, ooze, is used to depict the final sounds of the word “go”.

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