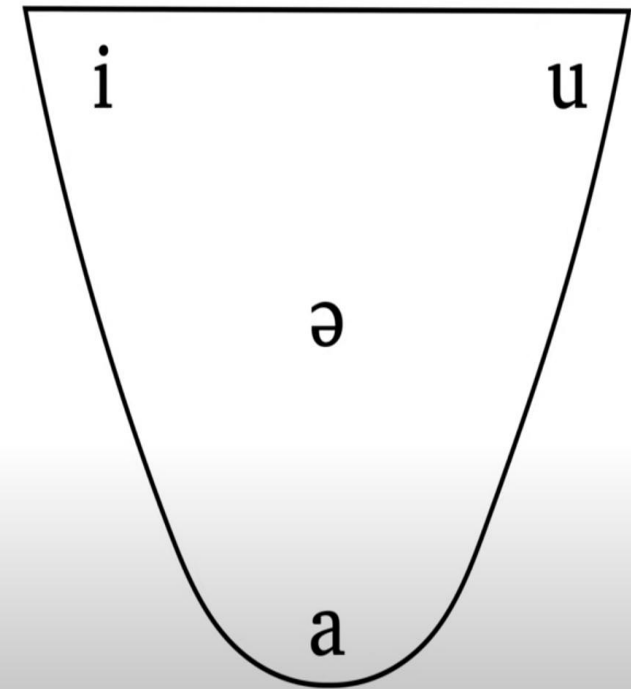
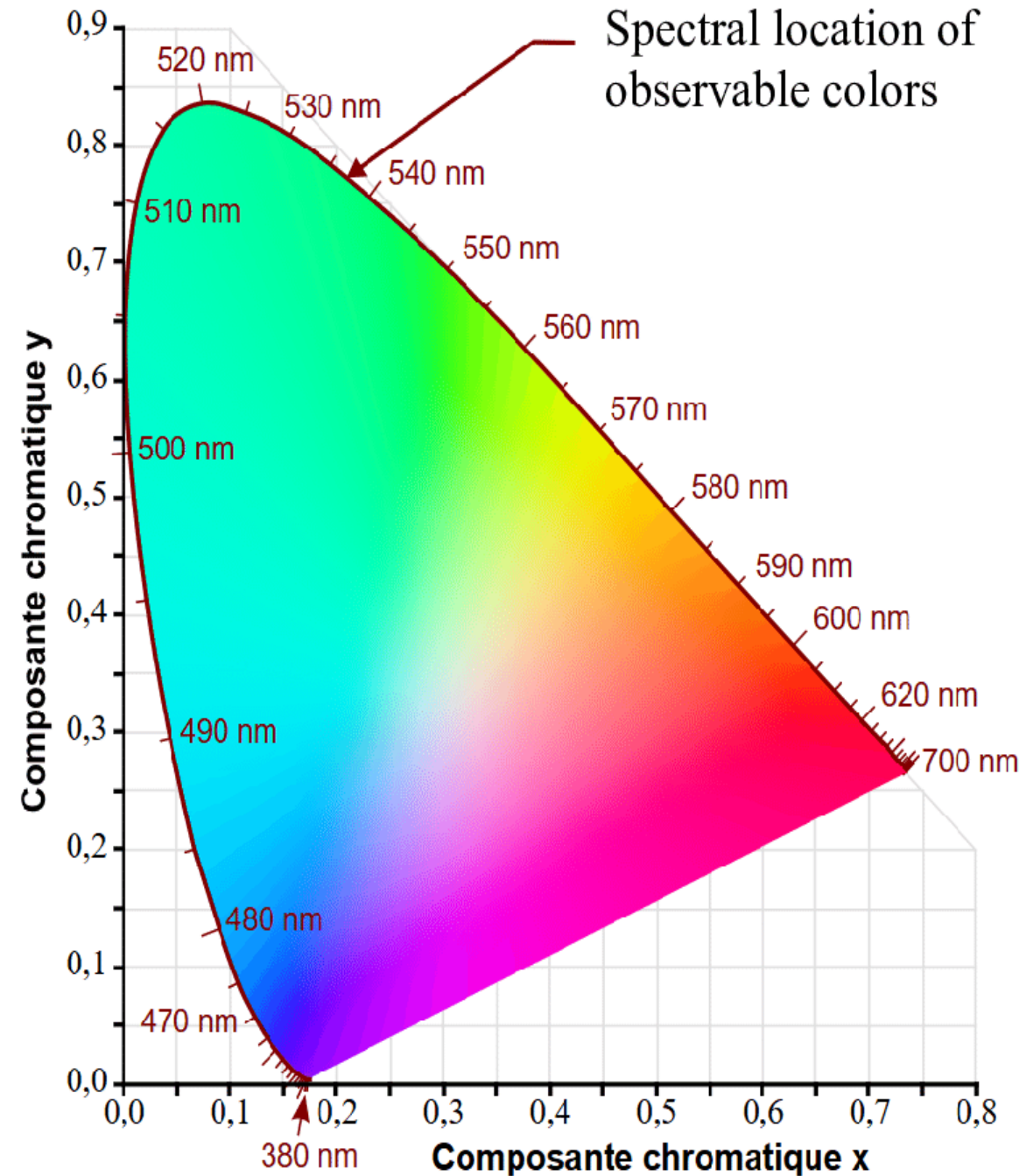


TEACHING PHONEMES WITH IPA



CUSTOMIZING IPA (APA) FOR CLASSROOM USE

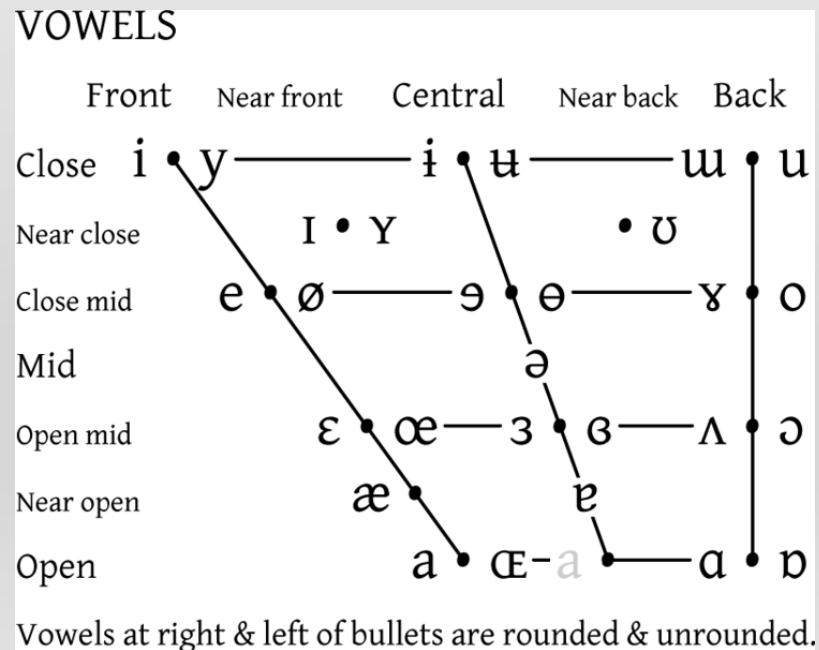
- THE PRIMARY GOAL IS **NOT** TO USE THE SYSTEM TO SHOW ACCURACY OR PRECISION BUT TO INTRODUCE A SYSTEM SO THAT STUDENTS CAN REVISUALIZE THE RANGE OF VOWELS AND SOUND INVENTORIES AND BEGIN COMPARING AND CONTRASTING ENGLISH WITH THEIR L1.
- IT GIVES THEM A TOOL TO GO FARTHER **IF** THEY ARE MOTIVATED TO DO SO.
- IF YOU ARE CURIOUS IF IPA WOULD BE HELPFUL TO YOUR CLASS, SIMPLY ASK YOUR STUDENTS HOW MANY VOWELS ENGLISH HAS. IF THEY ARE SAYING FIVE, THEN IPA **CAN HELP** THEM.

p	b	t	d	tʃ	dʒ	k	g
<u>pit</u>	<u>bit</u>	<u>tea</u>	<u>day</u>	<u>church</u>	<u>jog</u>	<u>cat</u>	<u>get</u>
f	v	θ	ð	s	z	ʃ	ʒ
<u>few</u>	<u>vet</u>	<u>think</u>	<u>the</u>	<u>seven</u>	<u>zoo</u>	<u>shoe</u>	<u>beige</u>
m	n	ŋ	h	l	r	w	j
<u>men</u>	<u>new</u>	<u>bring</u>	<u>hi</u>	<u>let</u>	<u>red</u>	<u>west</u>	<u>yellow</u>

p	b	t	d	tʃ	dʒ	k	g
<u>pit</u>	<u>bit</u>	<u>tea</u>	<u>day</u>	<u>church</u>	<u>jog</u>	<u>cat</u>	<u>get</u>
f	v	θ	ð	s	z	ʃ	ʒ
<u>few</u>	<u>vet</u>	<u>think</u>	<u>the</u>	<u>seven</u>	<u>zoo</u>	<u>shoe</u>	<u>beige</u>
m	n	ŋ	h	l	r	w	j
<u>men</u>	<u>new</u>	<u>bring</u>	<u>hi</u>	<u>let</u>	<u>red</u>	<u>west</u>	<u>yellow</u>

VOWELS *ARE* COMPLICATED

- The [chart below](#) is **not** designed for Teachers and Students. It is designed for Phoneticians and Linguists and shows all dialectal possibilities.
- The chart you find quickly is meant to show (frequency and location) and works for all languages. Even English only versions show all dialectal possibilities.
- Like the color spectrum graph it shows relative positions & individuals differ.
- Suggestion – post on your D2L simplified versions only.



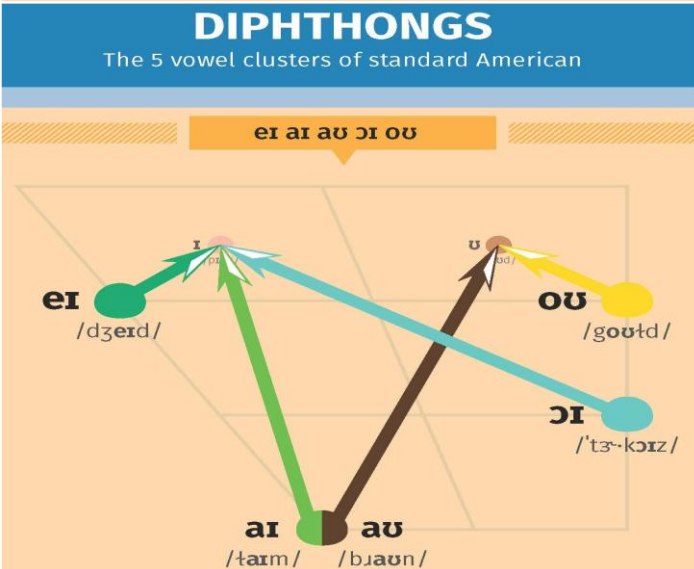
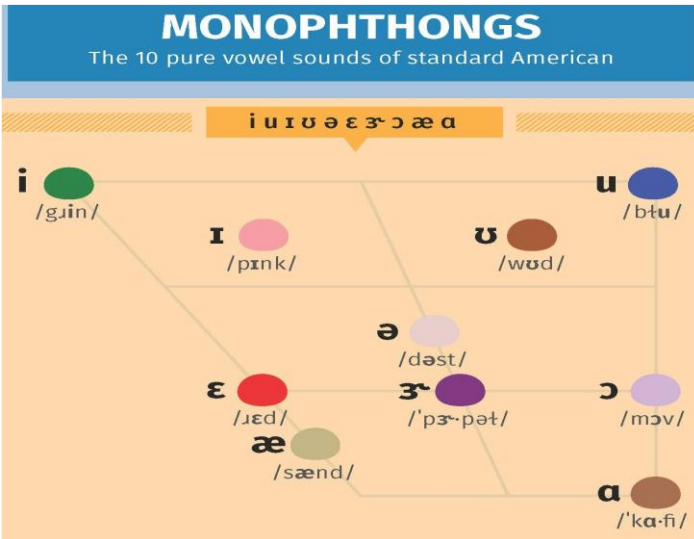
LET'S TAKE A QUICK GLANCE AT HOW UNHELPFULLY TECHNICAL VOWEL NOTATION CAN BE.

Vowels

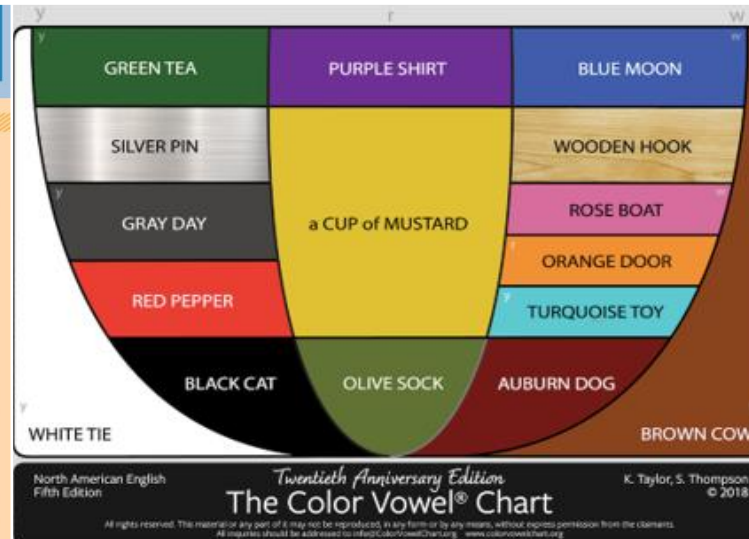
IPA	K&K	APA	NOAD	AHD	RHD	WBO	MECD	DPL	DPN	TBD	NBC	MWCD	OED	COD ^[a]	POD	Cham	CPD	SD	BLD	AB	Dictcom	BBC	Google AmE, BrE	Mac	Wikipedia	Examples
æ	æ	æ	a	ǣ	a	a	a	a	a	a	a	a	a	ǣ	a	a	a	a	a	ae	a	a (arr)	a	a	a (arr)	cat
eɪ	e	e(y)	ā	ā	ā	ay	ay	ā	ay	ā	ay	ā	ay	ā	ay	ā	eh	ay, a_e	ay	ey	ey	ay	ei	ay	ay	day
ɛər	ɛr	ɛr	e(ə)r	âr	âr	air	air	–	–	âr	air	er	air	âr	air	âr, er ^[e]	air	air	air	eh r	air	air	ehr, euh	air	air	hair
ɑ:	ɑ	a	ǣ	ǣ	ǣ	ah	aa	ǣ	aw, o	ǣ	ah	ǣ, ǣ	ah	ah	aa	ǣ	ah	ah	ah	aa	ah	aa	aa	ah	ah	father
ɑ:r	ɑr	ar	ār	ār	ār	ahr	aar	ār	–	ār	ahr	ār	ar	ār	aar	ār		ah	ar	ahr	aa r	ahr	ar		aar, aa	ar
ɛ	ɛ	ɛ	e	ě	e	eh	e	e	ɛ	e	e	e	e	ě	e	e	e	e	e	eh	e	e (err)	e/eh	e	e (err)	let
i:	i	i(y)	ē	ē	ē	ee	ee	ē	ē	ē	ee	ē	ee	ē	ee	ē	ee	ee	ee	iy	ee	ee	ee	ee	ee	see
ɪər	ɪr	ɪr	i(ə)r	îr	ēr	ihr	eer			ir	ier	ir	eer	ēr	eer	ēr		ihr	eer	iy r	eer	eer	eer, eeuh	ear	eer	here
ɪ	ɪ	ɪ	i	ĩ	i	ih	i	i	i	i	i	i	i	ĩ	i	i	i	i	i	ih	i	i (irr)	i	i	i (irr)	pit
aɪ	aɪ	ay	ī	ī	ī	y	ī	ī	y	ī	igh	ī	igh	ī	ī	ī	ai	eye, i_e, ye	ɪ	ay	ahy	igh, y	ai	uy	y, eye ^[f]	by
ɒ	ɑ	a	ǣ	ō	o	o	o	ǣ	o	o	ah	ǣ	o	ō	o	o	o	o	o	aa	o	o (orr)	aa, o	o	o (orr)	pot
oʊ	o	o(w)	ō	ō	ō	oh	ō	ō	ō	ō	oh	ō	oh	ō	ō	ō	oh	oh, o_e	oh	ow	oh	oh	ow	oh	oh	no
ɔ:	ɔ	ɔ	ô	ô	ô	aw	aw	ô	aw, o	ô	aw	ó	aw	aw	aw	ô	aw	aw	aw	ao	aw	aw	aa, aw	aw	aw	caught
ɔ:r	ɔr	ɔr	ôr	ôr						ôr	awr	ôr	or			ôr		aw	or	or	ao r	awr	or		or, aw	or
	or	o(w)r														ôr, ör ^[g]		or	or	awr, ohr					force	
ɔɪ	ɔɪ	ɔy	oi	oi	oi	oy	oy	oi	oy	oi	oi	ôi	oy	oi	oy	oi	oy	oi	oy	oy	oi	oy	oy	oy	oy	noise
ʊ	u	u	ōō	ōō	ōō	u	ōō	oo	u	û	oo	û	uu	ōō	ōō	û ^[h]	uu	u	uu	uh	oo	uu	u	oo	uu	took
ʊər	ur	ur	ōōr	ōōr	ōōr	ur	oor			ûr	oor	ûr	oor	oor		oor		oor	oor	uh r	oor	oor	oor, uor	oouh	oor	tour
u:	u	u(w)	ōō	ōō	ōō	oo	oo	ōō	û	û	oo:	û	oo	ōō	ōō	oo ^[h]	oo	oo	oo	uw	oo	oo	oo	ooh	oo	soon
aʊ	au	aw	ou	ou	ou	ow	ow	ou	ow	ou	ow	aû	ow	ow	ow	ow	ow	ou	ow	aw	ou	ow	aw	ow	ow	out
ʌ	ʌ	ʌ	ə	ũ	u	uh	u	u	u	u	uh	ə	u	ũ	u	u	u	uh	ə	ah	uh	u	uh	u	u	cut
ɜ:r	ɜr	ər	ər	ûr	ûr	ur	ur	ɛr	er	êr	er	ər	ur	êr	ər	ûr	ur	ur	ər	er	ur	ur	ur, uh	er	ur	word
ə	ə	ə	ə	ə	ə	uh	ə	ə	e	ə	uh	ə	uh	a, e, i, o, u	ə	ə	uh	uh	ə	ah	uh	uh	uh	uh	ə	about
ər	ə	ər	ər	ər	ər	uhr	ər	ər	er	ər	er	ər	ur	er	ər	ər		uh	ur	ər	er	er	uhr	r, uh	ər	ər
ju:	ju	yu	yōō	yōō	yōō	yoo	yoo	yōō	yū	yū	yoo:	yū	yoo	ū	yōō	ū		yoo	yoo	y uw	yoo	yoo	yoo	yooh	ew	view

Stress

SIMPLER
(15) TOTAL



SIMPLEST
(16) TOTAL & Available



Their teacher's guide explains this more, but basically, some on the left column rise and drive to /y/, /i/, or /ɪ/. Those in the right column tend to drift toward /w/, /u/ glides.

BEST
(15) TOTAL but not available



A few standard Diphthongs are included as distinct (but hard to see superscripts) Turquoise Toy & White Tie. What is missing here, and everywhere still, is GAE's merging with Black and Olive into a new Diphthong.

ALL OF THESE SHOW /r/ AS A VOWEL, THOUGH THE FIRST IS USING A BRITISH SYMBOL.

This gets us to 15 Vowels by including /R/ and two Pure Diphthongs ai & /aɪ/ & /ɔɪ/

NUMBER	NICKNAME	EXAMPLE NAME	SYMBOL	LINK & NOTES
1	LONG E	FLEECE	i	https://en.wikipedia.org/wiki/Close_front_unrounded_vowel
2		KIT	ɪ	https://en.wikipedia.org/wiki/Near-close_near-front_unrounded_vowel
3		FACE	e (D)	https://en.wikipedia.org/wiki/Close-mid_front_unrounded_vowel usually a DIPHTHONG in GAE
4	EPSILON	DRESS	ɛ	https://en.wikipedia.org/wiki/Open-mid_front_unrounded_vowel
5	ASH	TRAP/BATH	æ	https://en.wikipedia.org/wiki/Near-open_front_unrounded_vowel
6	Latin Turned Alpha		ɑ	https://en.wikipedia.org/wiki/Open_front_unrounded_vowel
7	SCHWA		ə	https://en.wikipedia.org/wiki/Mid_central_vowel The wedge just shows stress position.
8	Horseshoe U Upsilon	FOOT	ʊ	https://en.wikipedia.org/wiki/Near-close_near-back_rounded_vowel
9		GOOSE	u	https://en.wikipedia.org/wiki/Close_back_rounded_vowel
10		GOAT	o (PD)	https://en.wikipedia.org/wiki/Close-mid_back_rounded_vowel can be a pure vowel but almost always a DIPHTHONG in GAE
11	OPEN O	CLOTH	ɔ (PD)	https://en.wikipedia.org/wiki/Open-mid_back_rounded_vowel a pure vowel in many dialects (caught vs cot) but in GAE almost always a DIPHTHONG
12			ɑ	https://en.wikipedia.org/wiki/Open_back_unrounded_vowel

THREE THINGS ESSENTIAL TO USING IPA IN AN AMERICAN CLASSROOM

1. THE SCHWA /ə/, “THE COLORLESS”

THINGS TO TEACH STUDENTS

- It is the most frequent vowel in English.
- It can take any written vowel - *about*, *take**n***, *pencil*, *collide*, *supply*
- In some words, it forms every vowel – *above*, *Columbus*, *customer*, *bubblegum*, *double*
- Unstressed syllables are more and more likely to become schwas in natural speech.

THINGS TO WATCH OUT FOR

- **/ʌ/** The Wedge - basically a symbol that is completely unnecessary in the classroom. A wedge is a schwa in a stress position.
That's it! [Geoffrey Lindsey](#) explains this well.
- **/ɜ/** vs. **/ɛ/** open-mid (central vs front) unrounded vowel.
I see the first one, the Stir, used in a lot of British materials, see **Supplement 1**.
It is not used in GAE outside of Texas, the Midlands and the South.

RESOURCES FOR TEACHERS

- There are a multitude of videos and exercises covering this vowel.
Here is a good starter from [Tom Scott](#) – “I’m gonna” - /əmənə/.
- I like to use the phrase “buying a banana in Canada”, see **Supplement 2** for resource.

2. THE DIPHTHONG THING

THINGS TO TEACH STUDENTS

- The main thing to remember is that there are two common ways to transcribe diphthongs and both are accepted by IPA. Diacritics are used as well, but not in common dictionaries.
- When teaching IPA as a system, students will use different dictionaries and you will encounter differing materials, so both will invariably be encountered.

TWO THINGS TO TEACH STUDENTS

- Upsilon /ʊ/ are glides /w/ – this also represents a rounding of the lips.
- Kit vowels /ɪ/'s are /y/'s – this usually represents a rising close.
- Some dictionaries may use similar symbols such as /u/ or /i/.
- /h/'s usually represent an aspiration and aren't used by most dictionaries.

THAT'S IT!

IPA	APN	COLOR VOWEL CHART	CHART DIFFERENCE NOTE
eɪ	ey	Gray Day	
aɪ	ahy / ey	White tie	
ɔɪ	oi	Turquoise toy	The simple /ɔ/ is mostly Norther Eastern. Here, it is a diphthong only.
aʊ	ou	Brown Cow	
oʊ	noh	Rose Coat "no go"	The simple /o/ is not used much in GAE

3. THE VOCALIC R

2. THE VOCALIC R “Sir, her purple purse works!”

- /ə/ or R-Coloring — it colors or erases vowels, and more in American English.
It has become its own vowel which is not recognized by most dictionaries.
Some other labelling terms you may see – **semi-vocalic**, **liquid**, **tap** and **retroflex**.
In Western General English, the Schwa can easily be lost and here it is just its own vowel.
However, R-Coloring can also maintain the vowel:
 - /ɑ~/ *start, car*
 - /ɔ~/ *north, war* - **BRITISH USE THIS WE DON'T**
 - /ɜ~/ *standard, dinner, Lincolnshire* (unstressed)
 - /ɜ~/ I've also seen it explained as *only* an r-colored schwa /ə/,
but this is **not** technically accurate, especially if you consider non-rhotic dialects.
- [Mandarin](#) often uses as a phoneme; it is dialectal but it is the Beijing dialect and is called the Rhotic coda or [erhua](#).
In my experience, most Mandarin speaking students have little trouble.
- Spanish and Arabic trillers: “Stick a pen in your mouth.” Force them to practice bunching the tongue.

Getting getting the idea across that R is a vowel **AND** a consonant
is the goal.

2.a.- R's are weird – Some things to know

Rhotacization - Rhoticity (maintaining r's) vs. Non-Rhoticity (dropping r's)

- William Labov recently died, see **Supplement 3** a New York Times obituary.
- He helped establish that Rhotacization in English is a class marker with a long history. Hence, the large variation effects how, where, and when R-pronunciation is documented in language materials, but is driven by sociolinguistics.
- General American English has developed an r-pronunciation that is actually very rare in the world's languages and most dictionaries are still transcribed on older RP (British) standards.
- For example, when I began as a teacher, using R diacritics to show R-Coloring seemed widespread among materials; however, looking at **Supplement 4**, I found only Collins used one.

3.b. - The R's in English

[ɹ]

"Standard" R: postalveolar approximant

a common realization of the /r/ phoneme worldwide

[ɹ̠]

"Velarized" R

[ɹ̥]

"Retroflex" R

[ɾ]

"Flapped" or "Tapped" R: alveolar flap close to the flapped /t/ & /d/

[r̄]

"Trilled" or "Rolled" R: alveolar trill

[ʀ]

"Uvular" R: "Northumbrian burr"

[ʁ]

"Labial" or "Rounded" R: labiodental approximant

Other Phenomenon

Linking R: 'tuner amp', nonrhotic dialects, breaking the rule to include them.

Intrusive R: (Boston) – "I need a pizzar delivered to Senecar".

SOME FINAL CONSIDERATIONS

- Very few American dialects distinguish the TRAP and BATH sets – though many British dialects do, not an issue for learners but something that I have not seen reflected in ANY dictionary.
- Dark L and Light L – not a large issue for learners unless they are pronouncing L endings with aspirations – “Fall(eh), Pull(eh), Tell(eh)”
- Understanding that Japanese and Korean speakers have an /l/ /r/ allophone dialect helps explain where to focus, and that they are both using FLAPPED /r/’s that sound like our FLAPPED /d/’s.
- FLAPPING & TAPPING D’s, T’s and R’s is really just the voice of the preceding or surrounding vowels overwhelming the consonant.

A simple IPA Discussion Prompt I used to introduce the system to unexposed but advanced students

- **POST YOUR RESPONSE BY SUNDAY NIGHT**
- **You are free to use subtitles as you watch these three videos.**
- **In your post and using complete sentences, state which video you liked best and which video you liked least. Give at least one reason for each of your opinions.**

STARTER VIDEO:

<https://www.youtube.com/watch?v=9Kwita7Fot8> (Links to an external site.)

1. **Eric Singer: <https://www.youtube.com/watch?v=YU4Vi3Wukak> (Links to an external site.)**
2. **Patrick Auri: https://www.youtube.com/watch?v=kbJJRWKZK3s&feature=emb_logo (Links to an external site.)**
3. **Tom Scott: <https://www.youtube.com/watch?v=9uZam0ubq-Y> (Links to an external site.)**

DISCUSSION

OTHER APPROACHES TO PHONEMES

BURLINGTON IS A CLOSED SYSTEM

- No feedback for instructors

PHONICS - LONG VOWEL / SHORT VOWEL / MAGIC E

- Lack of materials or unusable materials, see **Supplement 5**
- Requires memorization of arbitrary rules
- It seems to serve native speaking children well that are learning spelling. This is a major K-12 debate and not approached here, see **Supplement 6**.
- Phonics (sounding out words vs whole word reading) is essentially a contrast paradigm that does not apply to ESL.

AMERICAN RESPELLING / RE-REPRESENTATION

- Designed for native speakers and *utilized by phonics*. As above, more of a K-12 debate.
- CULTURAL BUY-IN is often entirely absent in English Learner student demographics.

