

Itô & Mester—counteranalysis

		summary of facts							just for fun	
context		I&M prosody	example	McCarthy's E. MA r-linking	McCarthy's E. MA r-intrusion	Varis's Boston r-linking	Varis's ¹ Boston r-intrusion	Itô & Mester's Cockney/ Norwich r-intrusion	Gick's ² PA l-intrusion	tapping
no r	a utterance -final	...X) _U	idea_ mother	no	no	no				no (<i>cat</i>)
	b __C		spa_ seems haw_k, co_tton bar seems park, carton	no	no	no				no (<i>cat for atlas</i>)
depends on dialect, UR	c word-word	(wd) _ω (wd) _ω	saw_ Ann mere animals	yes	yes		no			yes (<i>sought Ed</i>)
	d func-word	(fnc(wrd) _ω) _ω	gonna_ eat to_ eat they're eating for eating	yes	no	yes	no	yes		yes (<i>at Ed</i>)
	e func-func	(...fnc(fnc...) _ω) _ω or ...fnc) _ω (fnc...	[give] ya_ a [job] [three] for a [dollar] you're a [little older]	yes	no			yes		yes (<i>[one] at a [time]</i>)
	f func, func (separate p-phrases)	...fnc) _ω } _φ {(fnc...	didja_ or [didn't ya] [I said I was] gonna_ and [I did] [If you] hafta_, I'll [help] ? (<i>don't know about underlying /r/</i>)	?	yes			no		yes (<i>buy it or [leave]</i>)
	g func, word	...fnc) _ω } _φ {(wd...	[If you] hafta_, Ann'll [drive] ? (<i>don't know about underlying /r/</i>)	?	?					
	l word, word	...wd) _ω } _φ {(wd...	[If you need] slawr, Ann'll [drive] [If you need] butter, Ann'll [drive]	?	?					
yes r	h word-suffix	(wd suff) _ω	draw_ing storing	yes	yes—but more stigmatized than below?		yes		yes	yes (<i>fighting</i>)
	i word-func	((wd) _ω fnc) _ω	draw_ it wore it	yes	yes		yes	yes	yes	yes (<i>bought it</i>)
	j word-func...	(wd) _ω (fnc...	law_ and [order] car and driver	yes	yes		yes	yes	yes	yes (<i>bought and [sold]</i>)
	k morpheme- internal	(...morph...) _ω	Sa_eed? (<i>probably</i> S[a]jeed) lorry hurray	yes	?					yes, unless pre-stress (<i>pity</i> vs. <i>petite</i>)

¹ Erika Varis (2004). Linking and intrusive r in a speaker of Boston English. Ms., UCLA.

² Bryan Gick (2002). The American intrusive l. *American Speech* 77: 167-183.

(1) I&M analysis of McCarthy

- *r* not allowed unless onset (*a, b*) (CODACONDITION)
- underlying *r* freely resyllabifiable as onset (*h, k*) or ambisyllabic (*c, d, e, f, g, i, j*) if V follows
- at beginning of maximal p-word, root node inserted to provide onset, spreads place from previous V (*c, g*): ONSET(ω_{\max}) >> DEP-root(ω -init)
- at beginning of onsetless syllable that doesn't initiate a p-word, also root insertion (*f, h, i, j*): ONSET >> DEP-root
- otherwise (at beginning of submaximal p-words) root node can't be inserted (*d, e*): DEP-root(ω -init) >> ONSET

(2) I&M analysis of Cockney/Norwich pattern

- same as for McCarthy's E. MA, except root node can be inserted anywhere (*d, e*): ONSET >> DEP-root(ω -init)

(3) How could I&M analyze the Varis data?

- Root node can't be inserted at beginning of any p-word, maximal or sub-: DEP-root >> ONSET(ω_{\max}), ONSET
 - but that means the *and* of *law and order* has to prosodify with the preceding word: (*law[r] and*) *order* (mismatch to where a pause would naturally be inserted)
- Varis's analysis: driving constraint is $*(\dots V.V\dots)_{\omega}$, and its domain is the p-word
 - again, means (*law[r] and*) *order*
 - also means $*(gonna\ eat)$, but instead (*gonna (eat)*) or (*gonna*) (*eat*)
- A hybrid possibility:
 - driving constraint is $*(\dots V.V\dots)_{\phi}$, hence no need to insert *r* in (*f*)
 - with a prohibition against inserting a root node at the beginning of a minimal (innermost) p-word, hence no *r*-intrusion in (*c, d*).
 - this makes a probably-wrong prediction, though: there should be *r*-intrusion in (*e*).

(4) A potential problem for the prosodic analysis

It seems strange to me to treat portmanteau function words like *gonna* as true clitics, since they normally bear stress (although not when super-reduced, as in *I'ma leave now*).

If the prosody is (*gonna*) (*eat*), then it's just like (*saw*) (*Ann*), and we can't get the McCarthy dialect.

(5) Counteranalysis—kernel

V-initial function words and suffixes have *r*-epenthesized allomorphs (used after certain vowels), by a Hayesian (1990) rule.

$$\emptyset \rightarrow r / [_ V \dots]_{\text{Frame 1}}$$

Frame 1: [+syll] [_]_{[-N, -V]}

Thus, for *and*, the lexicon produces *and* and [*rand*]_{Frame 1}

In the context *babies* ___ *toddlers*, *and* is inserted; in the context *law* ___ *order*, *rand* is inserted.

We also need underlying *r* to get deleted sometimes. We don't have full data for all the dialects on this, but at least for McCarthy's data, we can say that *r*-deletion is a postlexical rule that applies whenever the *r* is nonprevocalic.

Now come the problems and solutions/kludges...

(6) Problem: suffixes

Suffixes aren't supposed to go through the lexical phonology on their own! Perhaps they should be dealt with separately, through a word-internal hiatus-resolving rule within the lexical phonology. (And, as noted above, intrusive *r* with suffixes is supposed to be more stigmatized than cross-word intrusive *r*)

(7) Problem: Varis has no *r*-intrusion in p-phrase-boundary cases

e.g., *I said I was gonna _and I did*

If we can define this set of cases syntactically, then we can redefine Frame 1 for this dialect to take care of them:

Varis Frame 1: [CP...X...[+syll]] [___]_[-N,-V] ...]_{CP} i.e., not clause-initially

(8) Problem: McCarthy has *r*-intrusion at X-word boundaries

...except at func-func boundaries that aren't separated by a p-phrase boundary.

So we can have a general *r*-insertion rule (at we could have rewritten it to be word-final instead of word-initial), but exempt from it the func-func sequences...

McCarthy Frame 1: [...[+syll]]_[-N,-V] [___]_[-N,-V] (juncture of two function words)

... unless a clause juncture intervenes

McCarthy Frame 2: [+syll]]_{CP} [CP [___]_[-N,-V] (clause juncture)

The rule has to say something like

$\emptyset \rightarrow r / [_V\dots]$ unless Frame 1, unless Frame 2

This might be easier to state if the lexical phonology is governed by constraints:

INSERTR_{Frame2} >> DON'TINSERTR_{Frame1} >> INSERTR

“Clause juncture” is consistent with the p-phrase-juncture examples in McCarthy (I think—didn't double-check them all), but we might also be able to exploit the fact that in all the p-phrase-juncture cases, the first word, if a function word, is a portmanteau like *gonna* or *didja*. As McCarthy explains, this is because solo function words (*to*, *you*) don't get reduced when p-phrase-final, so they don't end with the right vowel.

(9) Predictions of making *r*-insertion lexical à la Hayes

- Different words could have different rates of *r*-intrusion. Testable only with a big corpus.
- There could be outright exceptions. Seems implausible given the loan, nonce, and foreign-accent data given.
- Other dialects could make finer syntactic distinctions, caring about VPs vs. NPs, for instance.
- Could be sensitive to empty categories: *Who_i was it you saw_ t_i at the beach?* I don't speak one of these dialects, but I suspect you get *r*-insertion there despite the trace.
- Can't follow (derivationally) a postlexical phenomenon. At least in McCarthy's data, *r*-insertion is fed by, e.g., *h*-deletion, but that's presumably lexical too (applies only to selected functions words).
- Hayes speculates that such rules should be sensitive to inserted pauses or speaking rate. The speaking-rate prediction is muddled in the U.S. case by interference from standard dialect, use of which is probably correlated with slower speaking rate (both are more likely in more-careful situations).

So this case certainly isn't a poster child for precompilation.

(10) Possible research topics, though data probably challenging to get

- environments of *l*-intrusion: where does it apply? (Gick describes how difficult it was to get any data on *l*-intrusion—requires an extremely relaxed style; you probably need family or close friends who do this in order to study it)
- corpus studies of *r*-intrusion:
 - What's the effect of frequency (word₁ and word₂)?
 - Is there a gradient effect of prosodic boundary strength (p-phrase vs. ip vs. utterance)?
 - Does syntax matter, beyond what would be expected by prosodic hierarchy (e.g., does Cockney/Norwich differentiate *the X* vs. *to/for X*, à la *Hiawatha*)? (Does there exist a phonetically transcribed corpus that contains enough non-rhotic speakers?)
- sociolinguistic study of *r* variation within a speech community: is there are hierarchy of contexts of *r* intrusion apparent in variation within individuals according to context, and across individuals? If so, can we make any grammatical sense out of that hierarchy—e.g., express it in terms of re-ranking some constraint?