

## CONCLUSION

Inter-tier Correspondence Theory (ICT) is a theory of candidate structure. By appealing to the percolation of information across nodes that stand in immediate domination, ICT captures effects of opacity and transparency all in one fell swoop. This is especially important and useful in analyzing languages such as Mandarin and Tianjin where both opaque and transparent derivational effects are simultaneously attested.

ICT requires that GEN produces candidates with all the relevant structures. This in itself is not new, since GEN is responsible for generating the optimal structural configuration given any linear input. What is new here is that each node in the structure carries information that corresponds to lower nodes, albeit imperfectly when warranted by high-ranked markedness requirements. Under ICT, mere adjacency does not count as marked collocations, it is constituency that does. Because of this property, terminal nodes always match the input string. This naturally yields the Non-Derived Environment Blocking effect required in traditional derivational frameworks. With the terminals stable (as they are not marked environments), faithful or unfaithful correspondences at higher nodes are determined by markedness.

The stability of terminals and their percolation upwards across tiers has the consequence of marrying both the containment and correspondence approaches of optimality theory. The effect of each candidate containing the input is captured in the terminals while the matter of correspondence is done across tiers. The containment approach to optimality theory easily captures opaque phenomena by way of preservation of input alternation-triggering environments. In ICT, this is possible because the

triggering environment is “ordered” in the way hierarchical structures are layered. ICT is therefore more restrictive because opacity cannot occur freely, it necessarily depends on structural configuration. Unlike the containment approach, the correspondence approach to optimality theory comfortably deals with transparent effects. This is because, under the correspondence approach, all alternation-triggering environments must be at the surface and must be resolved. It removes the awkwardness of expressing how one entity may simultaneously contain its previous incarnation. To see this, imagine an alternation where  $/+voice/ \rightarrow [-voice]$ , which under containment would require opposite specifications of a feature to contain each other. Under the correspondence approach, the two features simply correspond. ICT preserves the merits of correspondence theory in the most straightforward way – the correspondence of information across tiers. There is, however, one difference between ICT and the traditional correspondence approach. The traditional view of correspondence is global, i.e. between inputs and outputs with nothing in between. ICT’s correspondence does not leap from terminals to root, but happens via all the nodes in between. In that sense, inter-tier correspondence is local.

Correspondences of information across tiers lead to the appearance of encoding derivational histories, with intermediate tiers as intermediate steps of derivations. If this were true, then ICT is no more than a translation of derivations into optimality theoretic terms, which is not true. The appearance of derivation history in ICT comes from the hierarchical structures, not from derivations. Tianjin unambiguously illustrates this as it is the selection of prosodic structures that account for the “direction flip”. Tianjin tritonal sandhi directionality cannot be a comparison of derivational histories simply because (i) transparent derivation histories would always be more “faithful/economical” (depending

on whether one uses parallel or serial terminology) while being equally unmarked and (ii) there is simply no well-established reason for such a framework. Tianjin's directionality effect really stems from selection of the most harmonic prosodic structures under satisfaction of OCP. Therefore, ICT cannot be a matter of encoding derivational history. That said, there can be no question on what status is attributed to intermediate tiers. Traditional theories not devoid of structures, and ICT views intermediate tiers the same way as traditional theories do. That intermediate tiers carry information is not comparable with the intermediate steps in derivational theories except by way of convenient analogy.

A logical consequence of ICT is that root nodes look like the output string in traditional theories (derivational or optimality theoretic). However, to think of the root node as an output is to misconstrue each structural representation as a derivation. In fact, each structure is simply a way of organizing the input string, such that certain constituencies have certain correspondence relation with their mothers and daughters. To see the point from a somewhat different perspective, let us assume a traditional non-ICT structural representation. Is that structure an output? Does the output contain the structure? If yes, then it shares the same view with ICT – the physical acoustic signal may be devoid of structures, but the linguistic reality of it is not. If no, then traditional view must have some means of removing all that structure to leave only a linear string behind, which to be fair, so can ICT.

Perhaps a good way to view ICT is to consider a multi-layered club sandwich. In the making, layers are put in order, but in the eating, it hardly matters.