A number of converging lines of research have recently coalesced into an approach to morphology that combines classical WP models with contemporary data-driven methodologies. One component of this approach is a distributional view of language structure and language learning. Another is a complex system conception of morphological patterns and inventories. These components are united by a dynamic characterization of systems in terms of stable equilibria between competing communicative pressures, rather than in terms of derivational relations or static constraint satisfaction. This talk outlines some of the properties and implications of this perspective and reviews evidence that supports this type of approach over simple system models of morphology.