

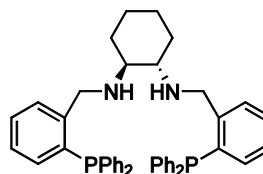
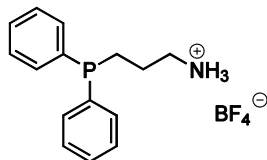
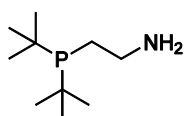
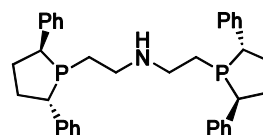
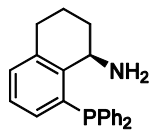
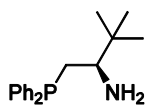
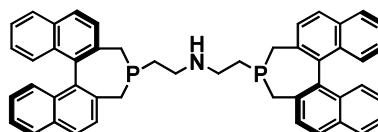
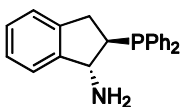
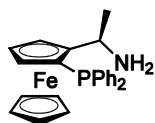
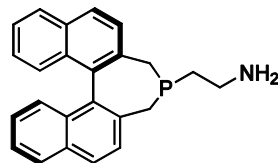
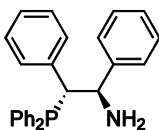
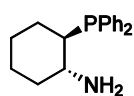


Aminophosphines: Ligands, Catalysts, and Applications

Ligand structure and composition plays a critical role in determining the activity and selectivity of a catalytic system. Among the numerous ligand classes developed, phosphines are the most widely used for various catalytic transformations. A new class of related ligands, aminophosphines, has been developed by Kanata Chemical Technologies. Aminophosphines exhibit high performance in a large array of catalytic transformations, rendering them “privileged” ligands for catalysis.

Ligand Diversity

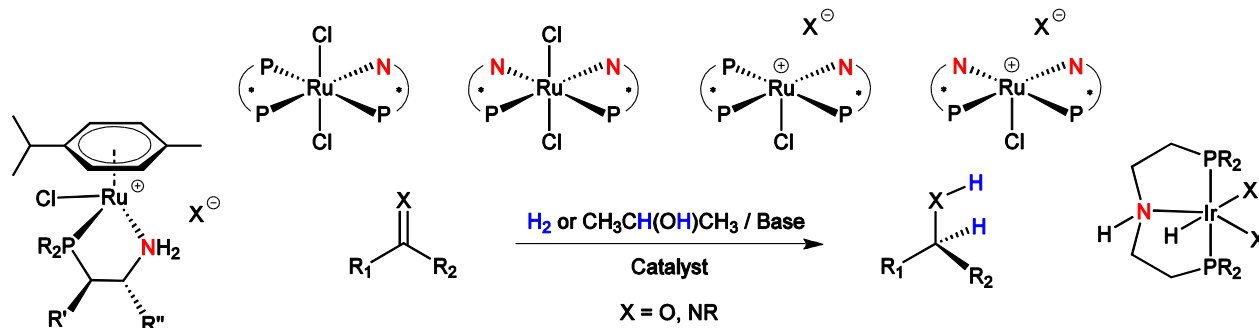
Kanata Chemical Technologies offers a diverse array of aminophosphine ligands, chiral and achiral, for catalytic transformations. These highly tunable ligands are set on well-established chiral scaffolds as well as novel motifs. New additions to our portfolio include quarternary aminophosphines with their increased air-stability and shelf-life.



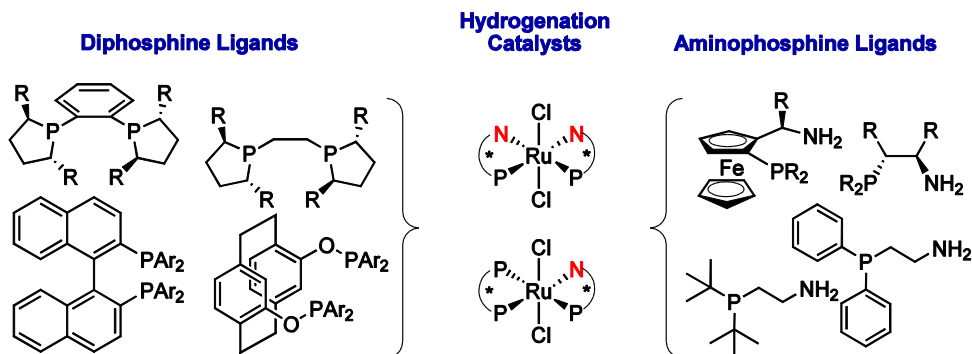


Catalyst Diversity

Aminophosphines can be complexed to Ru and Ir complexes generating catalytic systems for standard (using H₂) and transfer hydrogenation (using H₂ surrogates such as 2-propanol) with exceptional activity and selectivity. With the presence of chiral ligands, these complexes are highly efficient systems for production of chiral alcohols and amines.



With our diverse library of diphosphine and aminophosphine ligands, an unprecedented number of efficient hydrogenation catalysts can be accessed for HTS to maximize your success in hydrogenation chemistry.



Application

Aminophosphines have been used extensively in hydrogenation chemistry exhibiting best-in-class results in terms of turnover efficiency and selectivity. These new privileged ligands have also been used in cross-coupling, allylic alkylation, hydroformylation, conjugate addition, and cycloaddition.

For additional information on our aminophosphine portfolio, please contact us at chemistry@kctchem.com.