Chemical Reaction Capabilities

Chemical Reaction Experience & Capabilities

In addition to the classic methods of organic synthesis, Ricerca's process chemists and engineers have extensive experience with modern complex multi-step organic processing utilized for the production of innovative pharmaceuticals and specialty chemicals. A representative list of chemistries and reagents that have been successfully scaled and operated in our kilo lab and plant facilities is given below. If your requirements are not listed, PLEASE ASK US! It is likely that we have related experience since we are continually adding capabilities to our technology base.

- Cross-Coupling Reactions – Suzuki, Heck, Sonogashira, Negishi, Buchwald-Hartwig, Ullman
- Mitsunobu Reaction
- Chiral Synthesis
- Homogeneous Chiral Catalysis
- Chiral Resolution – classical, enzymatic, auxiliaries
- Hydrogenation – supported and homogeneous catalysts. Pressure to 450 psig
- Asymmetric Hydrogenation – precious metal complex catalysts
- Organic Azide Reactions
- Propoxylations
- Polymerizations – solution-based
- Grignard Reagents – Formation and reaction
- Pyrophorics – n-BuLi, t-BuLi, $LiAlH_4$, MeLi, DiBAL-H, Vitride, Borane complexes, Raney Nickel
- Chlorination – Cl_2, $SOCl_2$, PCl_3, PCl_5, $POCl_3$
- Brominations – Br, PBr_3, NBS
- Production scale chromatographic separations

Ricerca Biosciences: Your research partner of choice

Ricerca Biosciences, a contract development organization, provides science-based services to the pharmaceutical, biotech, and specialty chemical industries for the development and commercialization of new innovative products. Ricerca's 260,000 ft^2 complex is located on a 43-acre site in Concord, Ohio. The facility is equipped with a full complement of well-maintained instrumentation and processing equipment operated in rigorous regulatory compliance to the highest quality standards.