

# Key Delegate Challenges: 2020 and Beyond

 MEDICINAL CHEMISTRY

 BIOLOGY



## Research

When surveyed, delegates at the recent Biology/MedChem event pointed to research as their most challenging area for the next few years: among other things, those surveyed pointed to aligning external opportunities to internal research needs, translational research for oncology programs and progressing research during the COVID-19 pandemic.



## Money and Resources

The second most cited challenge for biology and medchem professionals related to money and other resources: delegates noted reimbursement, speed and cost of development, and access to funding in the infectious diseases space as particular troubles that would challenge them in the near future.



## Data (harmonisation, integration)

A major challenge for a large number of delegates related to issues around data: particular challenges cited included harmonisation and integration, finding opportunities to showcase the quality, reproducibility and depth of data, connecting heterogeneous data sources with varying models of ownership together and the availability of large enough datasets with consistent and valid metadata.



## Outsourcing and Collaboration

Delegates pointed to both outsourcing and seeking collaborators as another challenge for the next few years. Particular difficulties experts found included effectively managing internal work versus outsourced work, finding strategically-fit assets for collaboration, particularly in the vaccine area; and successfully managing CROs and university partners to run the company almost virtually.



## Finding and Validating Therapeutic Targets

Finding and validating therapeutic targets was another area challenging delegates for the foreseeable future. Delegates discussed looking for novel therapeutics, growing their pipeline over the coming years, validating the targets they have, and integrating multi-omic datasets for target discovery and validation.

# Key Delegate Challenges: 2020 and Beyond

 MEDICINAL CHEMISTRY

 BIOLOGY



## Covid-19

Unsurprisingly, one of the biggest challenges for delegates for the foreseeable future is the COVID-19 pandemic. Among the specific worries of surveyed experts, major fears included recruitment during the pandemic, dealing with working from home and progressing research.



## Streamlining and Increasing Efficiency

A number of delegates professed their roles in streamlining the company and increasing efficiencies, with projects set to continue into the near future. Specific challenges in this area included improving the effectiveness and efficiency of drug discovery and deconvoluting target.



## AI and New Technology

Surprisingly low on delegates' list of challenges for the coming years, AI and new technologies were still featured as one of the bigger overall problems of the near future. Specific mentions by delegates included phenotypically testing AI-generated molecules, research and development for the AI part of bioinformatics projects, and working with new hit-finding technologies.



## Regulatory Challenges

The regulatory side of the sector was another concern for delegates, albeit with fewer mentions than the above difficulties. Nevertheless, delegates noted regulatory comprehensiveness, overall regulatory strategy and navigating specific risk assessment frameworks with regard to investing in preclinical technology as issues for the coming years.



## Models

The final major problem delegates noted revolved around new and existing modalities, with experts noting that current issues include screening and in vivo models for rare disease, and leveraging new drug discovery modalities.