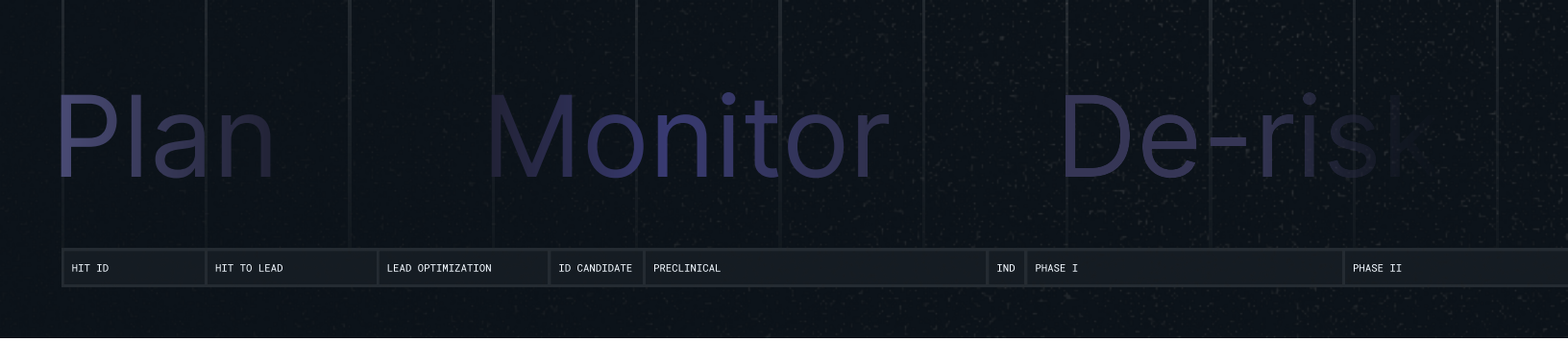


Operational Best Practices with Proven R.O.I.

Resource

Running an early stage biotech startup is essentially managing capital and optimizing time and resource investment.

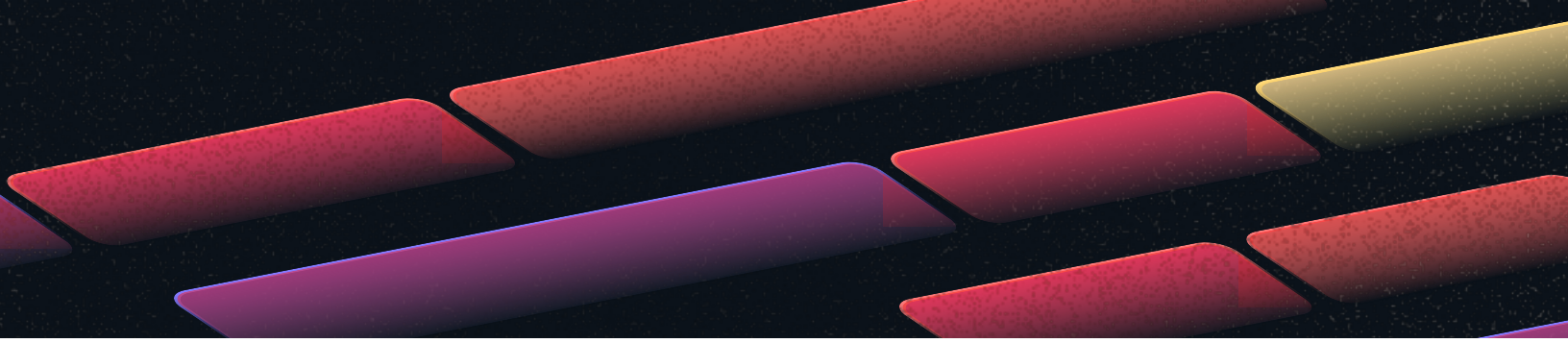
Scientific acumen and operational rigor are two equally critical pillars to keep the company moving. Scientific acumen tells you to invest in the right designs and candidates. Operational rigor makes you execute with precision, reduce resource waste and maximally extend your runway.

For founders who are scientists, the most effective approach is to combine your scientific intelligence with proven operational practices.

Crossbow therapeutics · VILYA · psivant · ordaōs · Forward Therapeutics · REZO · Wayfinder BIOSCIENCES

Kaleidoscope

Learn about the Kaleidoscope platform
https://kaleidoscope.bio



Plan

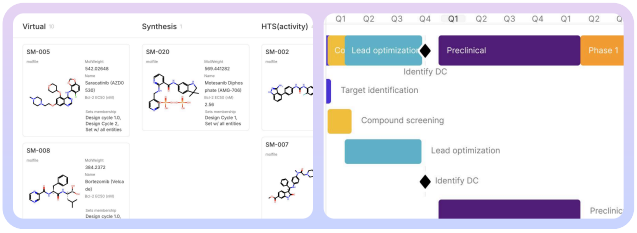
Plan all scientific work with clear expectations, and ensure actionable data and optimized decision making.

Best Practices

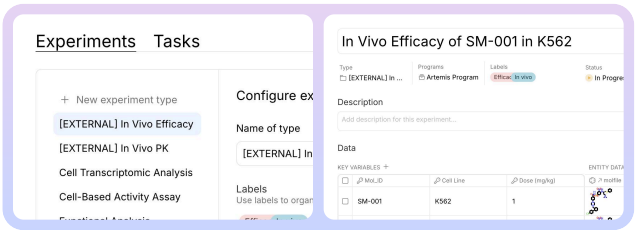
1. Document and communicate each stage of your R&D effort clearly with timelines, spending and ownership.
2. Plan both CRO and in-house work with clear criteria for completion.
3. Forecast experimental work by types and define input analytes and conditions.
4. Set clear expectation for data outputs from all R&D efforts (in-house and CRO).
5. Ensure all results (data) are driving decisions with clear criteria. Every piece of data need to serve the purpose of advancing or pivoting your program.
6. Optimize your decision making and minimize analysis paralysis, by focusing on the most critical data evidence among your candidates.

Software Needs

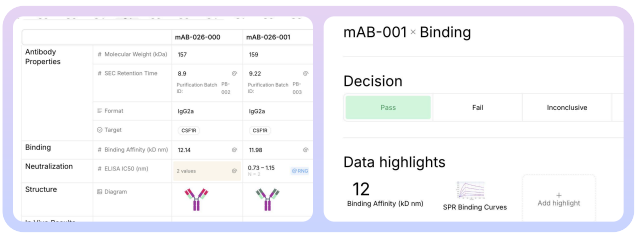
Captures plan details and renders plan visualization by time, type and other properties



Documents attributes of all experiment types, and consistently generates data placeholders



Surfaces data to directly enable decision making and program advancement



Monitor

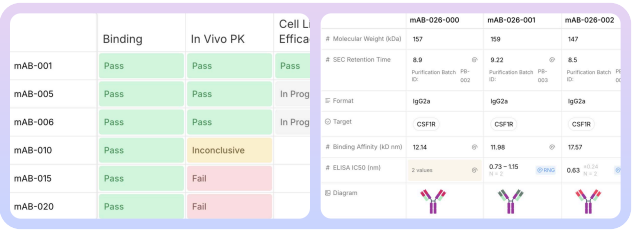
Track your spending (time and capital) against in-house and CRO results; adjust/pivot sooner than later

Best Practices

1. Ensure all in-house and CRO results (data) are directly viewable from your project and experiment planner.
2. Promptly review data and make critical decisions upon experiment results becoming available.

Software Needs

Enables data review directly in application without need for copy/paste via slides or docs



Case studies

Forward Therapeutics

How: Plan work, review data and drive decisions in Kaleidoscope without data copying or slide preparation

Therapeutic target: immunology and inflammation

ROI: > 1 day per week saved and reinvested

Ewan Taylor
CSO, Co-founder

psivant

How: Monitor and optimize compound progress from design to synthesis to decision, via improved in-house and CRO workflows

Therapeutic target: oncology

ROI: Meet annual milestone 2 months sooner

Shivam Patel
Head of Data Science

Crossbow therapeutics

How: Streamline data-to-decision via structured templates and systems auto-sync

Therapeutic target: immunology and inflammation

ROI: Increased confidence and days saved in decision making

Geraldine Paulus
Co-founder

De-risk

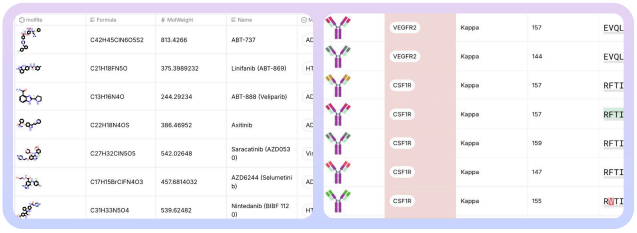
Prevent mislabeling and loss of critical data, unnecessary experiment redo's, and downstream costs of switching systems/tools

Best Practices

1. Ensure all designs and modalities are documented with properties in structured tables.
2. Enable consistent viewing and actioning via filter views and intuitive searches.
3. Document your experimental results as structured data linked to your designs and candidates.
4. Minimize use of spreadsheet attachments, or multiple forms of data-to-design association.
5. Start early on a future-proof system to build a culture of structured data management.

Software Needs

Structurally handles all modalities and their properties with flexibility allowing for innovation



Allows scientists to consistently log results and link them to designs and program stages

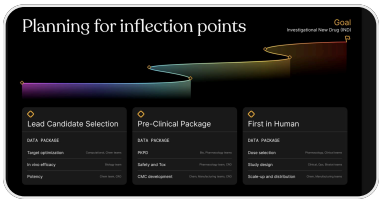
Additional resources

Learn about the Kaleidoscope platform
https://kaleidoscope.bio

Planning

Portfolio management in early stage drug discovery – a traveler's guide through uncharted territory ↗

"Management in discovery has to deal with projects covering multiple compounds, sometimes hundreds or even thousands each, that are synthesized, profiled and further optimized"



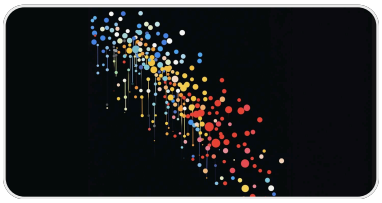
Plan smartly, execute precisely: the high-stakes game of chasing biotech value inflections ↗

"By knowing the ultimate goal, biotechs are able to understand the data necessary … and avoid costly pitfalls and ensure they're laser-focused on the right activities rather than chasing irrelevant data or duplicating efforts unnecessarily"

Monitoring

How to improve R&D productivity: the pharmaceutical industry's grand challenge ↗

"resolution of technical uncertainty early in development is necessary to improve R&D productivity. We refer to this as our 'quick win, fast fail' paradigm of drug development".



The 'too early to track' fallacy ↗

"Begin by defining some essentials that you want to track early on, and then add to that list as you scale. This approach allows you to take advantage of the structure you've put in place early on, while also building the muscle and encouraging the behavior of documenting things from the start."

De-risking

Achieving end-to-end success in the clinic: Pfizer's learnings on R&D productivity ↗

"…greater adoption of enhanced, objective, and quantitative methods, including elevating the importance of key scientific quality metrics, has enabled Pfizer to rapidly progress strong programs while stopping weaker programs earlier."

Ending the era of data-blind project managers ↗

"…teams using platforms like Benchling or CDD Vault end up doing double work, manually tracking in their project management systems what's already happening in their ELN. This introduces massive inefficiencies, increases risks of errors, and creates gaps where insights slip through."