

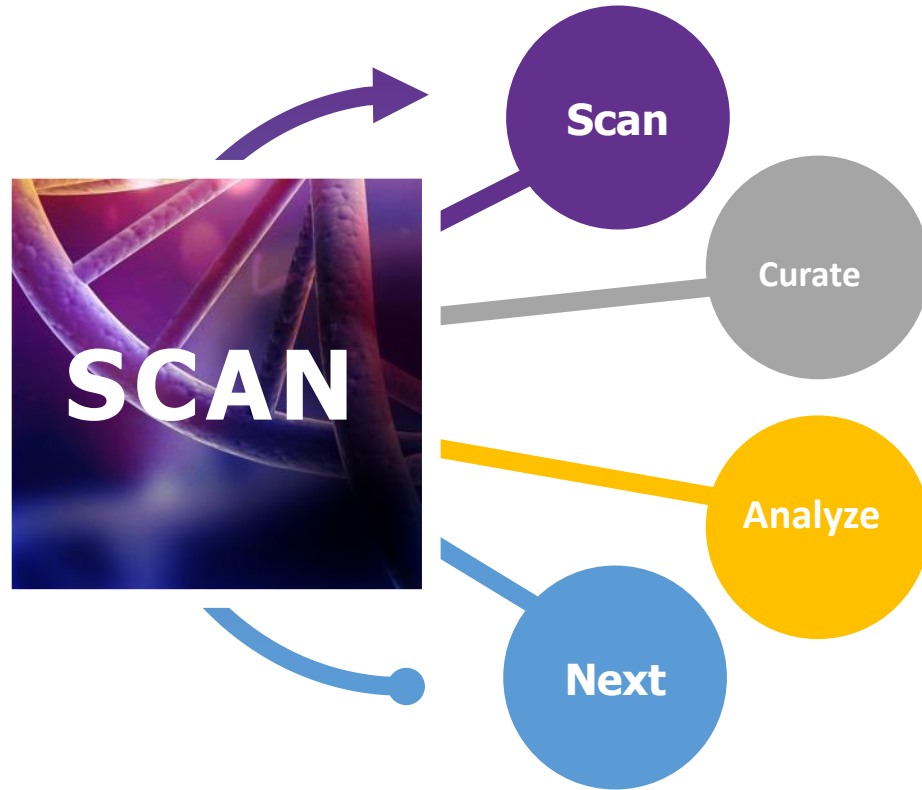
IHSI – Introduction to Horizon Scanning

Horizon scanning



1. Horizon scanning systems aim at identifying, filtering, and prioritising new and emerging health technologies with a considerable predicted impact on health, costs, society and the health care system in order to inform policymakers, purchasers, and health care providers or facilitate early access
2. Providing robust and usable data for price negotiations and decision makers of health care systems. Providing information to prepare for changes and high impact developments, strengthen resilience and leveling the playing field with industry.
3. Countries participating in IHSI have designed a tailor-made horizon scanning system with two main deliveries:
 - a) A regular High-Impact report containing a general overview of products of note
 - b) On-demand access to the overall database of unfiltered information on products
4. IHSI is built to be flexible in terms of methodology, content, and who can become a member
 - a) The database is open to any country that want to be a member
 - b) Much of the methodology has been newly developed and is designed to optimise horizon scanning
 - c) The database allows for flexibility to include other information than pharmaceuticals

Horizon Scanning Methodology Overview



SCAN

Find and retrieve relevant data

CURATE

Clean, categorize, and catalog data

ANALYZE

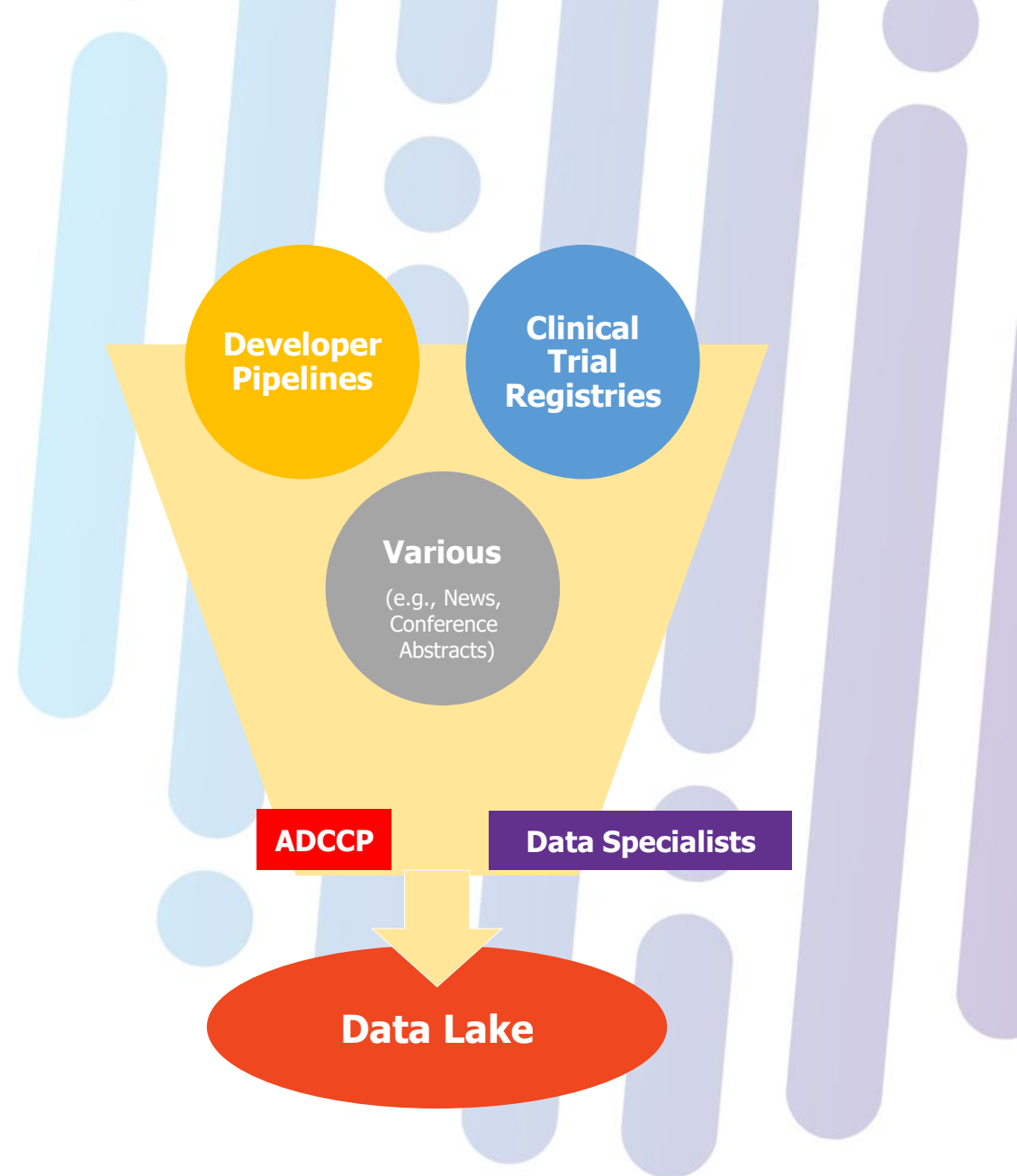
Identify and report on high impact topics

NEXT

Incorporate feedback to improve process

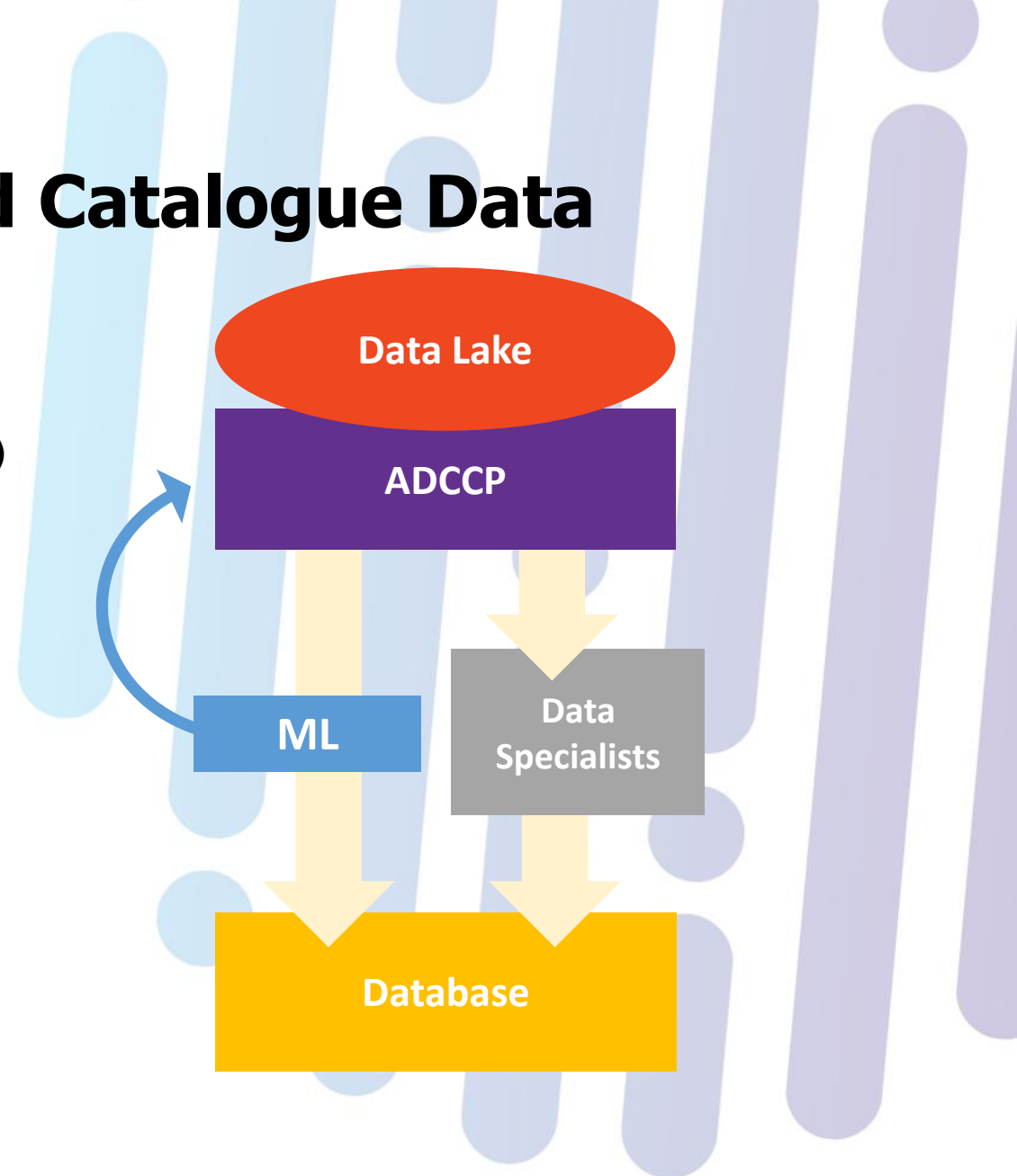
SCAN | Find and Retrieve Data

- Automated data collection and curation process (ADCCP) harvests structured and unstructured data
- Human data specialists harvest data difficult for ADCCP to obtain (e.g., developer pipeline images)
- Over time, system will rely more on ADCCP to increase efficiency



CURATE | Clean, Categorise, and Catalogue Data

- ADCCP sends data for
 - Automated curation
 - Human curation (informs machine learning [ML] algorithms)
- Create or update database records
- Each record updated at least every 28 days
- Updating continues until authorisation received or development ceases



ANALYZE | Identify and Report on High Impact Topics

- **Biannual High Impact Reports (HIRs) highlight pharmaceuticals with high potential impact to healthcare**
- **Selecting topics requires a robust and scientifically valid methodology**
- **Analysts continually monitor topics for signals indicating potential high impact**
- **Selected topics are developed into 2- to 5-page summaries (profiles) and sent to experts for review**

Topic Data Monitoring

Analyst Flags Topic

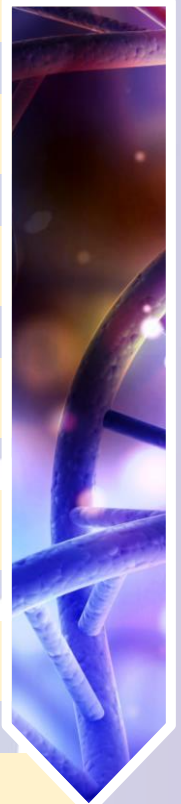
3-Member Panel Review

Topic Profiling

Expert Survey

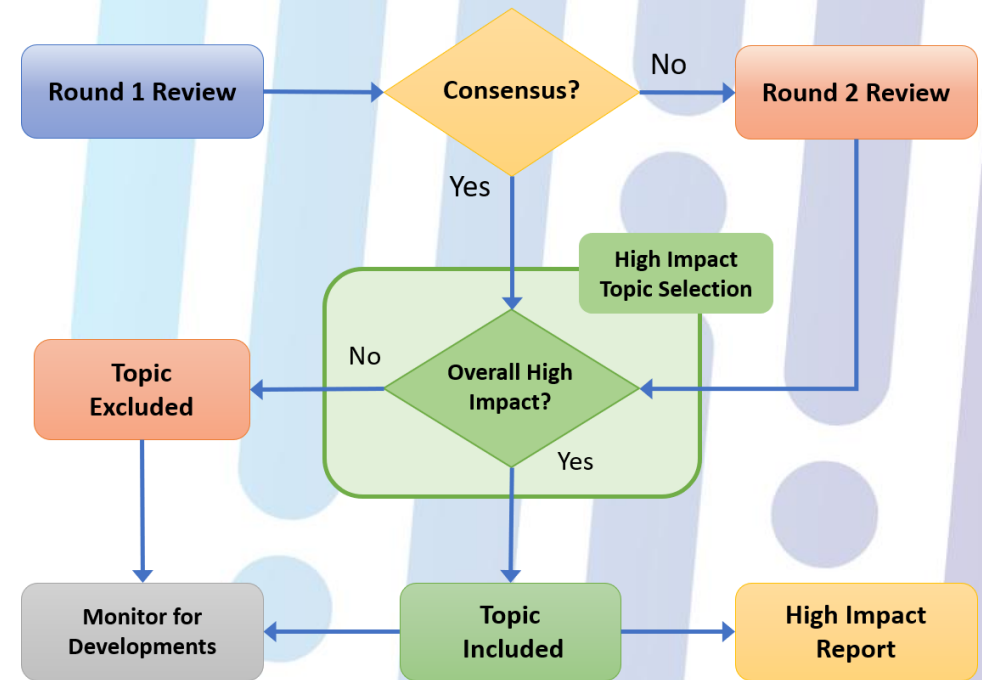
HIR Topic Selection

HIR Development



ANALYZE | Identify and Report on High Impact Topics (continued)

- Assemble a modified Delphi panel of at least 5 medical experts
- Experts read profile and complete brief survey (up to 2 times)
- Ratings and comments determine inclusion or exclusion in an HIR



ANALYZE | Identify and Report on High Impact Topics (continued)

- **Selected topics are drafted as summaries:**
 - **Intervention description**
 - **Relevant context and background**
 - **Potential impacts**
 - **Overall impact score**
- **Summaries are compiled into an HIR and reviewed by 2 qualified medical experts review each HIR before finalization and delivery**

Assignment

Topic-specific Searching

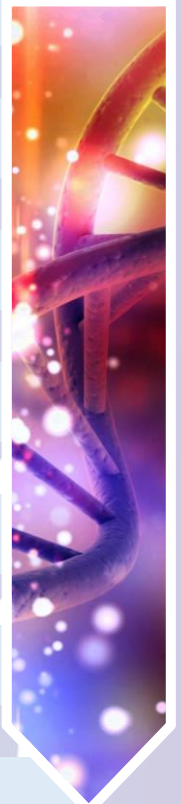
Analyst Drafting

Scientific Review

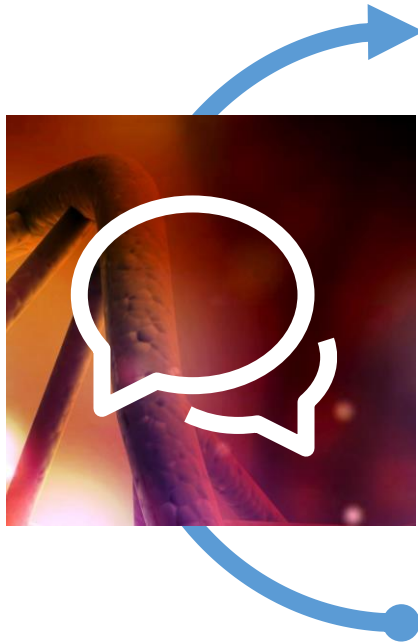
HIR Compilation

Report Summary

Expert Clinical Review



NEXT | Incorporate Feedback to Improve Process



- **Feedback from stakeholders will help improve or adapt horizon scanning methodology to better suit the needs of IHSI and its members**
- **Annual survey of IHSI members as to the usefulness of the HIRs and recommendations for improvement**
- **ECRI will meet with IHSI to determine whether any changes should be made**

Thank you