

31 OCTOBER - 1 NOVEMBER 2017 | RITZ CARLTON, WASHINGTON DC



# BIG DATA IN PRECISION MEDICINE

*PROVIDING AN EXECUTIVE PLATFORM TO FACILITATE THE SHARING  
OF GENOMIC AND PHENOTYPE DATA TO DRIVE CLINICAL PROGRESS*

JOIN THE MOST EXCLUSIVE PRECISION MEDICINE  
SUMMIT IN THE HEART OF WASHINGTON DC



**87%**  
DIRECTOR LEVEL  
& ABOVE



**175+**  
ATTENDEES



**135+**  
ORGANIZATIONS



**40+**  
EXPERT  
SPEAKERS

CONFIRMED PRECISION MEDICINE INNOVATORS INCLUDE:



**Dr Cecilia Schott,**  
VP Precision Medicine, Global  
Product & Portfolio,  
**AstraZeneca**



**Mike Restuccia,**  
SVP CIO,  
**University of Pennsylvania  
Health System**



**Dr Teresa Zayas Caban,**  
Chief Scientist, Acting Chief of  
Staff, Office of the National  
Coordinator for Health  
Information Technology,  
**US Department of Health  
and Human Services**



**Dr Balazs Flink,**  
Head of Clinical Trial Analysis,  
**Bristol Myers Squibb**



**Dr Jean-Claude Zenklusen,**  
Director, Cancer Genome Atlas,  
National Cancer Institute,  
**National Institute of Health**



**Dr Andrew Kernytzky,**  
Head of Computational Biology,  
**CRISPR Therapeutics**

*"Excellent speakers representing multiple stakeholders in creating and utilizing big data in precision medicine."*

Dr William Dalton, CEO, M2Gen

REGISTER NOW AT [WWW.BIGDATALEADERSFORUM.COM](http://WWW.BIGDATALEADERSFORUM.COM)

# AGENDA

DAY 1 // 31st October 2017

## The path from Big Data to precision medicine

08.30 CHAIR INTRODUCTION – THE PATH FROM DATA ANALYTICS TO PRECISION MEDICINE

- What are the challenges in combining comprehensive data, collected over time, from genetics, environment and lifestyle, to advance disease understanding and interception, aid drug discovery and ensure delivery of appropriate therapies?

08.35 [PANEL] THE CHALLENGES OF ADAPTING DRUG DEVELOPMENT AND HEALTHCARE TO THE AGE OF PERSONALIZED THERAPIES

- How are we setting research objectives within biopharma for 'precision medicine' and how will new insight translate into advancement for clinical investigations/experimental therapeutics?
- If our vision of precision medicine is to deliver diagnostic tests and to identify responsive patients, alongside new targeted therapies, what pressure will this put on development resources, including the unprecedentedly large volumes of data early in preclinical and clinical testing?
- How can the industry plan to recoup development costs with precision drugs targeting only a subset of a particular patient population? Where is the profitability?

Panellists:

**Dr Rick Dewey**, Senior Director, Head of Translational Genetics, **Regeneron**  
**Dr Cecilla Schott**, VP, Precision Medicine, Global Product & Portfolio Strategy, **Astrazeneca**  
**Dr Kelly Zou**, Senior Director & Analytic Science Lead, Real World Data & Analytics, **Pfizer**  
**Dr Ravinder Dhawan**, Vice President & Head of Oncology, Center for Observational & Real-World Evidence (CORE), **Merck**

09.10 [RESERVED] ESTABLISHING THE CAPABILITIES TO VALIDATE AND SECURELY MANAGE LARGE, COMPLEX DATA SETS INVOLVED IN MASSIVE GENOME SEQUENCING PROJECTS

09.25 IDENTIFYING THE FUTURE NEEDS FOR BIG DATA IN MEDICINES REGULATION

**Dr Sean Khozin**, Senior Medical Officer, Office of Hematology and Oncology Products, Center for Drug Evaluation and Research, **FDA (Invited)**

09.40 TRANSFORMING THERAPEUTIC DISCOVERY AND DEVELOPMENT USING AN INTEGRATED OMICS STRATEGY

**Dr Karen Akinsanya**, Associate Vice President, Translational Research, Insights & Analytics & Partnering, **Merck**

09.55 [PANEL] FOSTERING A COLLABORATIVE APPROACH TO EVALUATING –OMICS AND PHENOTYPE DATA

- Encouraging collaboration among industry players and other stakeholders: What is the strategy? What can our resources achieve and how do we need to partner?
- How can partnerships in a diverse range of projects and sharing data across a broad research community, increase our understanding for the mechanisms of disease and potentially accelerate the development of clinically useful markers, targets and therapeutics?
- How can we help to accelerate a broad adoption of clinical data standards and fully realize the vision of semantic interoperability, in order to give us the ability to exchange data rapidly with meaning and actionable insights?

**Dr Marc S. Williams**, Director, Genomic Medicine Institute,

**Geisinger Health System**

**Jonathan Chainey**, Global Head, Data Standards, PD Biometrics, **Roche**

**David R. Bobbitt**, MSc, MBA, President and CEO, **CDISC**

**Dr Jane Wilkinson**, Senior Director, Genomics Platform Projects & Alliances, **Broad Institute**

**Dr Victoria Gamerman**, Head of Health Informatics & Analytics,

**Boehringer Ingelheim**

10.25 [ROUNDTABLE DISCUSSIONS] ESTABLISHING MULTI-STAKEHOLDER DRUG DEVELOPMENT

- The one-company in-house approach of the past has transitioned to a network-driven model that must create closer collaboration between the industry and other parties
- How can we shifting our strategy from an application-centric focus to a data-centric focus; where investigators strive to aggregate data from all sources into a centralized repository, giving clinicians access to this knowledge pool with virtually any analytics tool or user interface

**Table 1: Dr Jim Ford**, Director of Clinical Cancer Genomics, **Stanford Cancer Institute**

**Table 2: Dr James O'Leary**, Chief Innovation Officer, **Genetic Alliance**

**Table 3: Collaborative efforts and big data approaches to reduce the burden of common genetic disorders**

**Chair: Prof Iftikhar Kullo**, Cardiovascular Disease, College of Medicine, **Mayo Clinic**

**Table 4: Christian Schubert**, Director, Business Development & External Innovation, **Biogen**

**Table 5: Hosted by Signet Accel**

**Table 6: Hosted by PPD**

**Table 7: Prof John Quackenbush**, Director, Center for Cancer Computational Biology, **Dana-Farber Cancer Institute**; CEO, **GenoSpace**

11.25 CHAIR INTRODUCTION

11.00 Morning coffee served in the exhibition area

## How are digital technologies supporting precision medicine?

11.30 [PANEL] THE USE OF PUBLIC AND PRIVATE DATABASES TO SUPPORT THE PRACTICE OF GENOMIC MEDICINE

- Is it really acceleration by collaboration? Can innovative partnerships hold great potential for pharma R&D? What is the goal - to look at a subgroup of patients (eg. 10,000) or at each individual?
- The logistical challenges of delivering a large research study - how is it possible to enrol all these patients?
- The scope and role of registries; determining the clinical impact of molecular profiling on disease types

**Dr Daniel Auclair**, SVP Research, **Multiple Myeloma Research Foundation**

**Dr Brad Perkins**, Chief Medical Officer, **Human Longevity**

**Dr Amy Abernethy**, Chief Medical Officer, **FlatIron Health**

**Dr Grant Wood**, Clinical Genetics Institute, **Intermountain Healthcare**

11.55 DATA ANALYSIS IN GENE EDITING

**Insight from CRISPR Therapeutics**

- Landscape of CRISPR guide sites and their off-targets as well as designing hybrid capture libraries to enrich the genome for off-target edit detection

**Dr Andrew Kernytsky**, Head of Computational Biology, **CRISPR Therapeutics**

12.15 PREDICTIVE MODELING OF HEALTH RISKS AND HEALTH OUTCOMES USING INTEGRATIVE ANALYSES OF CLINICAL, BIOMEDICAL, ENVIRONMENTAL, BEHAVIORAL, AND SOCIO-DEMOGRAPHIC DATA

**Dr Vasant G Honavar**, Professor and Edward Frymoyer Chair of Information Sciences and Technology, and Professor of Computer Science and of

Bioinformatics and Genomics, Director, Artificial Intelligence Research Laboratory, Director, Center for Big Data Analytics and Discovery Informatics, Associate Director, Institute for Cyberscience, **Pennsylvania State University**

12.30 ARTIFICIAL INTELLIGENCE TO FURTHER OUR UNDERSTANDING OF DENGUE DISEASE AND VACCINATION MECHANISMS

**Dr Dany DeGrave**, Senior Director Innovation Programs & External Networks, **Sanofi**

12.45 [RESERVED] WHAT COULD ARTIFICIAL INTELLIGENCE MEAN FOR PHARMA?

13.00 [PANEL] ARTIFICIAL INTELLIGENCE: ACHIEVING PRECISION MEDICINE AT SCALE

- Methods to integrate clinical, molecular, and real world data at large scales to build tremendous cloud-based holistic models for simulation experiments and investigation into disease
- Managing and deriving value from quantitative patient data to understand patient sub-populations, identify biomarkers of disease onset, progression, or patient stratification, assess clinical risk, and uncover mechanistic understanding of disease
- By applying unsupervised deep learning to massive data we expect to identify new biomarkers and precise phenotypes that can serve as the foundation for building personalized diagnostic and treatment pathways

Panellists: speakers of the session plus:

**Dr Andrew Swick**, SVP Product Development & Scientific Affairs,

**Life Extension**

13.30 Buffet Lunch served in the exhibition area

"A fine meeting with a number of fantastic talks by leaders in industry, academia, and NIH. Speakers were available outside of their presentations for in-depth questions and networking.

Dr Marek Grabowski, Research Scientist, University of Virginia

# AGENDA

DAY 1 // 31st October 2017

## Organizing medical and genomic knowledge for precision medicine

- 14.30 CHAIR INTRODUCTION
- 14.35 LARGE, HETEROGENEOUS, MULTI-SOURCE DATASETS SUPPORT PRECISION MEDICINE  
**Dr Anthony Kerlavage**, Acting Director, Center for Biomedical Informatics and IT, **National Cancer Institute**
- 14.50 INTEGRATION OF OMICS SCIENCES TO ADVANCE BIOLOGY AND MEDICINE  
**Dr Andrew Johnson**, Head, Biomedical Informatics, NHLBI Population Sciences Branch, The Framingham Heart Study, **NHLBI**
- 15.05 PRESENTATION RESERVED
- 15.20 [PANEL] ORGANIZING MEDICAL AND GENOMIC KNOWLEDGE FOR PRECISION MEDICINE
- Integrating large, complex, heterogeneous, multi-source data-sets. What are the latest protocols, and examples from research, on end-to-end data characterization, manipulation, processing, cleaning, analysis and validation?
  - Data diversity and quality: What is the right data for precision medicine?
- Panelists- speakers of the session plus  
**Leo Barella**, Chief Enterprise Architect, **AstraZeneca**

## Transforming datasets into actionable information

- 14.30 CHAIR INTRODUCTION
- 14.35 TRANSFORMING THERAPEUTIC DISCOVERY AND DEVELOPMENT USING AN INTEGRATED GENOMICS STRATEGY  
**Dr Rick Dewey**, Senior Director, Head of Translational Genetics, **Regeneron**
- 14.50 HIGH DEFINITION MEDICINE: A VISION FOR THE UTILITY OF PERSONAL HEALTH DATA  
**Dr Ali Torkamani**, Director of Genome Informatics & Drug Discovery, **The Scripps Translational Science Institute**
- 15.05 [RESERVED] IDENTIFYING DISEASE BIOMARKERS FROM MULTI-OMIC DATA AND CLINICAL OBSERVATIONS.
- 15.20 [PANEL] TRANSFORMING DATASETS INTO ACTIONABLE INFORMATION
- Seeking new models to connect expanding sets of disparate, non-identified patient-level data streams to better develop and commercialize next-generation medicines
  - The need for practical, evidence-based approaches: improving study design by better linking indications and target endpoints; better patient stratification using better inclusion/exclusion criteria and biomarker-based segmentation approaches; using outcomes analysis to determine optimal care paths; evaluating medical value and real-world evidence in decision-making
- Panelists:  
**Dr Cathy Marshall**, Director, Clinical Data Sciences, **Pfizer**  
**Dr Michael Boedigheimer**, Director, Computational Biology, Medical Sciences, **Amgen**  
**Dr William Dalton**, CEO, **M2Gen**

15.45 Afternoon refreshment

## How is precision medicine initiatives changing drug development?

- 16.10 CHAIR INTRODUCTION
- 16.15 USING A PRECISION MEDICINE STRATEGY TO OVERHAUL THE ENTIRE BUSINESS MODEL
- How clinical and real-world evidence can show the efficacy of a given treatment and demonstrate it as a cost-effective and long-term treatment option
  - Using a precision medicine strategy how can we overhaul the entire business model across the lifecycle and identify trends and opportunities, even before approaching payers and regulators
- Dr Hui Cao**, Executive Director, CoE for RWE, **Novartis**
- 16.30 [PHARMA ROUNDTABLES] SETTING RESEARCH OBJECTIVES WITHIN BIOPHARMA FOR 'PRECISION MEDICINE'
- Using a precision medicine strategy, how can we overhaul the entire business model across the lifecycle and identify trends and opportunities, even before approaching payers and regulators
  - Advancing a 'Smart' Data first strategy: If our vision of precision medicine is to deliver diagnostic tests, to identify responsive patients, alongside new targeted therapies, what pressure will this put on development resources, including the unprecedentedly large volumes of data early in preclinical and clinical testing?
- Table 1: Utilizing data to better identify new drug candidates and/or treatment indications**  
**Table 2: Identifying disease biomarkers from multi-omic data and clinical observations**  
**Table 3: Text mining and language processing for precision medicine**
- 17.00 [PANEL] TRANSLATING GENOMIC INFORMATION INTO CLINICAL MEDICINE  
**Dr Jean C. ZenKlusen**, Director, The Cancer Genome Atlas, National Cancer Institute, **National Institutes of Health**  
**Dr Sandy Farmer**, Executive Director, Genome Sciences & Technologies, **Pfizer**  
**Dr Nicholas Marko**, Director of Neurosurgical Oncology, **Geisinger Health**
- 17.30 CLOSE OF DAY 1 CONFERENCE SESSIONS - DRINKS RECEPTION IN THE EXHIBITION AREA

## How is precision medicine initiatives changing the delivery of healthcare?

- 16.10 CHAIR INTRODUCTION
- 16.15 MEDICAL EDUCATION, BIOMEDICAL RESEARCH AND EXCELLENCE IN PATIENT CARE  
**Patrick Farrell**, Senior Director, Data Analytics, **Penn Medicine**
- 16.30 [PANEL] WHAT TECHNOLOGY CENTERS ARE DOING TO EMBRACE PRECISION MEDICINE
- Setting objectives in precision medicine – how have initiatives changed with the recent development of large-scale biologic databases, new methods to characterize patients and computational tools for analysing large sets of data
  - Beyond hype cycle: What experiments are being done in health systems which are affecting clinical care? What are the near-term focuses (cancers?) and longer-term aims in generating knowledge applicable to the whole range of health and disease?
- Joseph Dudas**, Divisional Chair, Enterprise Analytics, **Mayo Clinic**  
**Jeff Waldron**, Executive Directors, **PM Connective**  
**Dr Paul Nagy**, Deputy Director, Johns Hopkins Medicine Technology Innovation Center, **John Hopkins University School of Medicine**  
**Mike Restuccia**, SVP CIO, **Penn Medicine**  
**Dr Teresa Zayas Caban**, Chief Scientist, Acting Chief of Staff, Office of the National Coordinator for Health Information Technology, **US Department of Health and Human Services**
- 17.00 [HEALTHCARE ROUNDTABLE] REALIZING THE POTENTIAL OF PRECISION MEDICINE IN HEALTHCARE
- Creating opportunity through new data architecture
  - Increasing value and engagement with healthcare analytics
  - Overcoming the significant challenges for the broad implementation of precision medicine in healthcare: insufficient evidence generation, data sharing and infrastructure challenges, slow uptake of genomic information into clinical care and research, the economics, and achieving greater patient and clinician engagement and trust
- 17.30 CLOSE OF DAY 1 CONFERENCE SESSIONS - DRINKS RECEPTION IN THE EXHIBITION AREA



# AGENDA

## DAY 2 // 1st November 2017

### Precision medicine clinical trials

- 09.00 CHAIR INTRODUCTION
- 09.05 INTEGRATING CLINICAL TRIAL ANALYTICS SOLUTIONS UNDER ONE CENTRALIZED ORGANIZATION TO DRIVE ENTERPRISE LEVEL DECISION-MAKING THROUGH DATA
- Developing end to end integrated, predictive analytics that set research objectives, help drive R&D strategy and execution with clear ties to long term financial impacts
- Dr Balazs Flink**, *Head of Clinical Trial Analytics, Bristol Myers Squibb*
- 09.25 INTEGRATION OF PRE-CLINICAL AND CLINICAL STUDIES TO PUSH RESEARCH FORWARD
- Dealing with the variety of biomedical data and real-world evidence by managing scale and complexity
  - Advancing a portfolio of targets through an R&D pipeline using evidence beyond genetic associations and genomic correlations to disease states
- Dr Ray Liu**, *Sr Director & Head, Advanced Analytics & Statistical Consultation, Takeda*

- 09.45 ANALYTICS OF INCREASINGLY LARGE REAL-LIFE DATA SETS
- Leverage analytics to turn big data sets into smart systems
  - How can real world, clinical evidence inform drug development?
- Dr Oliver Luttringer**, *Global Head, Modeling & Stimulation, Real World Evidence, Novartis*
- 10.00 [RESERVED] CONVERTING THE PROMISE OF PRECISION TRIALS INTO VALUE
- 10.20 PANEL: REAL-WORLD DATA: A NEW OPPORTUNITY TO STRENGTHEN THE PROCESS
- Panellists:
- Dr Shuvayu Sen**, *Executive Director, Outcomes Research & Access, Merck*  
**Dr Elise Berliner**, *Director, Technology Assessment Program, Center for Outcomes & Evidence, AHRQ*
- 10.45 [TECHNOLOGY SHOWCASE] HOW ARE DIGITAL TECHNOLOGIES IMPACTING HOW WE RUN CLINICAL TRIALS?  
HOSTED BY PPD

11.00 Refreshment break

### Big Data and the promise of precision medicine in cancer

- 11.30 CHAIR INTRODUCTION
- 11.35 STANDARDIZED DATA MODEL FOR ONCOLOGY ANALYTICS
- Ari Caroline**, *Chief Analytics Officer, Memorial Sloan Kettering Cancer Center*
- 11.50 CROSS-PROGRAM EXPLORATION OF CLINICAL DATA ACROSS THE IMMUNO-ONCOLOGY PORTFOLIO USING DATA LAKES AND VISUALIZATIONS
- Philip Ross**, *Director of Clinical Translational Data Science, Bristol Myers Squibb*
- 12.05 [RESERVED] GENOMIC TECHNOLOGIES AND PHENOTYPE DATA TO STRATIFY PATIENT POPULATIONS IN CLINICAL TRIALS
- 12.20 A PLATFORM FOR PERSONALIZED THERAPY IN MYELOMA
- Dr Kenneth Shain**, *Scientific Director, Moffitt Myeloma Working Group, Moffitt Cancer Center*
- 12.35 [PANEL] PREDICT DRUG RESPONSES IN CANCER RESEARCH
- Panellists: Speakers of the session

### Precision medicine for managing chronic diseases

- 11.30 CHAIR INTRODUCTION
- 11.35 HOW PERSONALIZED DATA CAN MAXIMIZE THE EFFECT OF CHRONIC DISEASE TREATMENT
- Correlating genomic insights with environmental, behavioural and medical factors to have a more holistic view of disease
- Dr Iris Grossman**, *VP, Head of Personalized & Predictive Medicine, Teva Pharmaceuticals*
- [CASE STUDIES] PRECISION MEDICINE STRATEGIES IN CHRONIC AIRWAY DISEASES, DIABETES AND CARDIOVASCULAR DISEASE
- 11.50 CASE STUDY 1
- Dr Chengming Gu**, *Vice President, Medical Affairs, Pfizer China*
- 12.10 CASE STUDY 2 RESERVED
- 12.30 [PANEL] PAVING THE WAY FOR SYSTEMS BIOLOGY AND PRECISION MEDICINE IN MULTIPLE DISEASE AREAS
- How do we get from real world datasets to cell biology?
  - Precision insights have the ability to identify distinct patient subgroups, non-genomic mechanisms of disease initiation and
- Panellists- speakers of the session plus
- Dr Hui Cao**, *Executive Director, CoE for RWE, Novartis*

13.10 Lunch

### Applying precision medicine in neuroscience

- 14.10 CHAIR INTRODUCTION
- 14.15 IMMUNO-DEMENTIA: HUMAN GENETICS-GUIDED DRUG DISCOVERY FOR ALZHEIMER'S DISEASE
- Dr. Akihiko Koyama**, *Head, Integrated Biology Engine, Andover Innovative Medicine Institute*
- 14.30 PRESENTATION RESERVED
- 14.45 TOWARDS PRECISION MEDICINE IN PSYCHIATRY: BRIDGING THE GAP FROM BIG DATA TO BIG INSIGHTS
- Dr Gayle Wittenberg**, *Head, Translational Research & Precision Medicine, Pharma R&D IT, Director, Integrative Solutions & Informatics, Neuroscience, Janssen Research & Development*
- 15.00 [PANEL]: ACCELERATE TRANSLATIONAL AND CLINICAL RESEARCH IN NEUROLOGICAL DISORDERS THROUGH ASSESSING DATA OF NOVEL THERAPIES
- Bringing efficiency strategies and infrastructure to clinical research
  - Establishing and managing disease-specific research consortia
  - Custom design of clinical research protocols
- Panellists, speakers of the session plus:
- Dr Alex Sherman**, *Director, Strategic Development & Systems, Neurological Clinical Research Institute, Massachusetts General Hospital*

- 15.25 DATA-DRIVEN INTEROPERABILITY
- Accelerating the impact of research information exchange
  - Maximizing existing research data storage and empowering discovery teams
  - Mining disparate data as it is, where it is
- Dr Philip Payne**, *Chief Scientific Officer, Signet Accel*

15.45 Refreshment break

- 16.05 [RESERVED] USING BIG DATA TO UNDERSTAND RARE DISEASES
- 16.25 INTEGRATED GENOMIC ADVANCES AND ITS IMPACT ON CLINICAL TRIAL DESIGN AND DELIVERY
- Supporting GSK drug assets by using genetic biomarkers to help predict efficacy and better understand adverse events
- Dr Charles Cox**, *Head of Pharmacogenetics, GSK*
- 16.45 MOVING TOWARDS GENOMICS DRIVEN PRECISION MEDICINE IN ASIA
- 17.00 CLOSE OF CONFERENCE

# SPEAKERS ALREADY CONFIRMED INCLUDE:

**Dr Cecilia Schott**

VP Precision Medicine, Global Product & Portfolio  
**AstraZeneca**

**Dr Jean-Claude Zenklusen**

Director, Cancer Genome Atlas  
**NCI**

**Dr Brad Perkins**

Chief Medical Officer  
**Human Longevity**

**Dr Anthony Kerlavage**

Acting Director, Center for Biomedical Informatics and IT  
**National Cancer Institute**

**Dr Ray Liu**

Senior Director & Head, Advanced Analytics & Statistical Innovation  
**Takeda Pharmaceuticals**

**Dr Grant Wood**

Clinical Genetics Institute  
**Intermountain Healthcare**

**Dr Daniel Auclair**

SVP Research Research  
**MMRF**

**Dr Paul Nagy**

Deputy Director, John Hopkins Medicine Technology  
**John Hopkins University School of Medicine**

**Dr James Ford**

Director of Clinical Cancer Genomics  
**Stanford Cancer Institute**

**Dr Rick Dewey**

Senior Director, Head of Translational Genetics  
**Regeneron**

**Dr Andrew Johnson**

Head, Biomedical Informatics, Population Science Branch  
**NHLBI**

**Dr Marc S. Williams**

Director, Genomic Medicine Institute  
**Geisinger Health System David Bobbitt**  
President and CEO  
**CDISC**

**Cathy Marshall**

Director, Clinical Data Sciences  
**Pfizer**

**Dr James O'Leary**

Chief Innovation Officer  
**Genetic Alliance**

**Dr Jane Wilkinson**

Senior Director, Genomics Platform Projects & Alliances  
**Broad Institute**

**Dr Elise Berliner**

Director, Technology Assessment Program, Center for Evidence and Practice Improvement  
**AHRQ**

**Dr Kenneth Shain**

Scientific Director, Moffitt Myeloma Working Group  
**Moffitt Cancer Center**

**Jonathan Chainey**

Global Head, Data Standards, PD Biometrics  
**Roche**

**Dr Shuvayu Sen**

Executive Director, Outcomes Research & Access  
**Merck**

**Dr Joseph Dudas**

Division Chair, Enterprise Analytics  
**Mayo Clinic**

**Dr Alex Sherman**

Director, Strategic Development & Systems, Neurological Clinical Research Institute  
**Massachusetts General Hospital**

**Dr Iris Grossman**

VP, Head of Personalized & Predictive Medicine  
**Teva Pharmaceuticals**

**Dr Ali Torkamani**

Director of Genome Informatics & Drug Discovery  
**The Scripps Translational Science Institute**

**Dr Sandy Farmer**

Executive Director, Enterprise Scientific Technology Operations  
**Pfizer**

**Dr Hui Cao**

Executive Director, CoE for RWE  
**Novartis**

**Dr Balazs Flink**

Head of Clinical Trial Analysis  
**Bristol-Myers Squibb**

**Mike Restuccia**

SVP CIO  
**University of Pennsylvania Health System**

**Leo Barella**

Chief Enterprise Architect  
**AstraZeneca**

**Dr Rick Dewey**

Senior Director, Head of Translational Genetics,  
**Regeneron**

**Dr Philip Ross**

Director of Clinical Translational Data Science  
**Bristol Myers Squibb**

**Dr Ari Caroline**

Chief Analytics Officer  
**Memorial Sloan Kettering Cancer Center**

**Dr Kelly Zou**

Senior Director & Analytical Science Lead  
**Pfizer**

**Jeff Waldron**

Executive Director  
**PM Connective**

**Dr Andrew Swick**

SVP Product Development & Scientific Affairs  
**Life Extension**

**Dr Charles Cox**

Head of Pharmacogenetics  
**GSK**

**Dr Victoria Gamerman**

Head of Health Informatics & Analytics  
**Boehringer Ingelheim**

**Patrick Farrell**

Senior Director, Data Analytics,  
**Penn Medicine**

**Dr William Dalton**

CEO,  
**M2Gen**

**Dr Karen Akinsanya**

Associate VP Translational Research, Insights & Partnering  
**Merck**

**Dr Ravinder Dhawan**

Vice President & Head of Oncology, Center for Observational and Real-World Evidence (CORE)  
**Merck**

**Dr Michael Boedigheimer**

Director, Computational Biology, Medical Sciences  
**Amgen**

**Dr Dany DeGrave**

Senior Director Innovation Programs & External Networks  
**Sanofi**

**Dr Chengming Gu**

Vice President, Medical Affairs  
**Pfizer**

**Dr Gayle Wittenberg**

Head Translational Research & Precision Medicine  
**Janssen Research and Development, LLC**

**Dr Iftikhar Kullo**

Principal Investigator, Cardiovascular Disease, College of Medicine  
**Mayo Clinic**

**Dr Philip Payne**

Chief Scientific Officer  
**Signet Accel**

**Dr Nicholas Marko**

Director of Neurosurgical Oncology  
**Geisinger Health**

**Dr Olivier Luttringer**

Global Head, Modeling and Simulation, Real World Evidence  
**Novartis**

**Dr Amy Abernethy**

Chief Medical Officer  
**Flatiron Health**

**Dr Akihiko Koyam**

Head of Integrated Biology Engine  
**Eisai**

**Dr Teresa Zayas Caban**

Chief Scientist, Acting Chief of Staff, Office of the National Coordinator for Health Information Technology  
**US Department of Health and Human Services**

**Dr Andrew Kernytsky**

Head of Computational Biology  
**CRISPR Therapeutics**

**Dr. Akihiko Koyama**

Head, Integrated Biology Engine  
**Andover innovative Medicine Institute**

**Dr Vasant G Honavar**

Professor, Computer Science, Bioinformatics and Genomics, and Neuroscience Graduate Programs, Director, Artificial Intelligence Research Laboratory, Director, Center for Big Data Analytics and Discovery Informatics, Associate Director, Institute for Cyberscience  
**College of Information Sciences and Technology**

**Christian Schubert**

Director, Business Development & External Innovation  
**Biogen**

**Dr Sean Khozin**

Senior Medical Officer, Office of Hematology and Oncology Products, Center for Drug Evaluation and Research  
**FDA (Invited)**

WANT TO JOIN THIS STELLAR PANEL?

There are still speaking opportunities available - contact Peter Harkness now on [peter.harkness@phacilitate.co.uk](mailto:peter.harkness@phacilitate.co.uk) or on +44(0)20 7384 8027

More speakers are being confirmed all the time, to see the latest list visit [www.bigdataleadersforum.com](http://www.bigdataleadersforum.com) now!



*"Great and enthusiastic mix of people responsible for planning and doing, creating value, solving problems, serving patients."*

Mr Jeff Gallagher, CEO, Virginia Bio



Explore a showcase of the latest practical applications from leading data pioneers, and meet the technology experts who can deliver the rapid and crucial business transformation you need



Facilitate partnerships, data-sharing and collaboration with a uniquely holistic and executive audience taking part in discussion-based presentations and roundtable sessions



Identify exactly what datasets and analysis is needed to drive precision medicine forward with a program addressing all types of data



Set research objectives and establish projects at a strategic level with the budget holders and key decision-makers in the largest precision medicine programs

*"Great event, right sized to be able to have direct, constructive interaction with national leaders from government, academia, and industry."*

Mr Morgan Crafts, Deputy Director, Tech, Life Science, Northrop Grumman

Previous sponsors include:



**BOOK YOUR CONFERENCE PASS NOW TO SAVE \$\$\$s!**

**EARLY BIRD**

Until Friday 15 September 2017

Delegate Type .....	Rates
Pharma/Biotech/CRO.....	<b>\$1,795</b>
Academic/Govt/Not-for-Profit.....	<b>\$895</b>
Technology/Service Provider.....	<b>\$2,995</b>

**STANDARD RATES**

Delegate Type .....	Rates
Pharma/Biotech/CRO.....	<b>\$1,995</b>
Academic/Govt/Not-for-Profit.....	<b>\$995</b>
Technology/Service Provider.....	<b>\$2,995</b>

**FOR INFORMATION ON:**

Small company rates • Group discounts • 1 day attendance  
 Contact Phacilitate now on [team@phacilitate.co.uk](mailto:team@phacilitate.co.uk) or call +44 (0)20 7384 7993

**JOIN THE CONVERSATION AT [WWW.BIGDATALEADERSFORUM.COM](http://WWW.BIGDATALEADERSFORUM.COM)**