

# Possible Next Steps

- Engage DOD groups in ongoing pilot/demo project (eMERGE, GMDP, etc); mechanisms to be explored
- Directed discussion with PCORI on expanding genomic medicine/genomic research projects
- Convene FDA/CMS/private payers to review and advise on GMDP and eMERGE demostartion projects with longer term goal of general principles
- Standards/IT/policy project
- Discussion needed on national strategy. First steps are to understand with greater detail the goals, resources, barriers, for each agency and how they play in the ecosystem (consider T1-T4 framework).

<b>Components of GM Implementation Strategies</b>	<b>UK</b>	<b>Canada</b>	<b>Italy</b>	<b>ESF</b>	<b>CAP</b>	<b>IOM</b>	<b>AMA</b>
<b>Service delivery infrastructure for requesting and receiving genomic results</b>	X		X	X	X		
<b>Provider- and patient friendly, model genomic interpretive test reports and patient consultations</b>					X		
<b>Bioinformatics infrastructure for relating clinical characteristics to variants</b>	X	X	X	X	X	X	X
<b>Data sharing in accessible research databases</b>	X			X	X		X
<b>Standardized phenotypic, patient, variant, and reference information</b>	X			X	X	X	X
<b>Assessment of health economics and cost-effectiveness</b>	X	X	X		X	X	X
<b>Evidence of clinical validity and utility</b>	X	X	X	X	X	X	X
<b>Consent model</b>	X			X			X
<b>Training/workforce development</b>	X		X	X	X		
<b>Ethical and legal framework to protect against potential abuses</b>	X	X			X		X
<b>Engaging public and building awareness</b>	X	X	X	X			
<b>Genomics-based risk stratification and communication</b>		X	X				
<b>Genetic test regulation or registration</b>			X		X		X
<b>Use of patented medical information and conflict of interest in medical innovation</b>					X	X	X
<b>Reimbursement for genomic testing, interpretations and consultations</b>					X		X
<b>Equitable access</b>	X		X	X			X

<b>Components of GM Implementation Strategies</b>	<b>AF</b>	<b>VA</b>	<b>CMS</b>	<b>FDA</b>	<b>AHRQ</b>	<b>ASH</b>	<b>PCORI</b>	<b>CDC</b>
Service delivery infrastructure for requesting and receiving genomic results		X						
Provider- and patient friendly, model genomic interpretive test reports and patient consultations		X						
Bioinformatics infrastructure for relating clinical characteristics to variants	X	X		X	X			
Data sharing in accessible research databases					X	X		
Standardized phenotypic, patient, variant, and reference information	X	X		X				X
Assessment of health economics and cost-effectiveness			X		X			
Evidence of clinical validity and utility		X	X	X	X			X
Consent model	X					X		
Training/workforce development		X						
Ethical and legal framework to protect against potential abuses	X	X				X		
Engaging public and building awareness	X	X					X	
Genomics-based risk stratification and communication	X							X
Genetic test regulation or registration			X	X				
Use of patented medical information and conflict of interest in medical innovation								
Reimbursement for genomic testing, interpretations and consultations				X	X			
Equitable access	X	X	X		X	X	X	

# The UK Human Genomics Strategy Group

- Monitor advances in genetic and genomics evaluate their benefit to healthcare services in the NHS
- Ensure successful translation of laboratory and academic research into quality care
- Develop infrastructure to enable access to high quality genomic and genetic testing services
- Develop the bioinformatics platform needed to underpin genomic and genetic testing
- Train the NHS and public health workforce
- Articulate the legal and ethical issues around the use of genomic data
- Raise public awareness of genomic technology and how it can be used to benefit the care of patients across the NHS

# Is a National Strategy Possible?

## The UK Has a Bold Vision

*By 2020:*

- *The NHS will be a world leader in the development and use of genomic technology in the areas of healthcare and public health*
- *Genomic information and clinical genetic testing will be used across the NHS*
- *Healthcare providers within the NHS will confidently use genomic information within their roles*
- *Effective public engagement will increase awareness of the role of genomic information in healthcare*

# Possible Outcomes

- White paper describing needs within US and possible approaches for addressing them
- Commonalities in interests or opportunities across agencies as foundations for collaboration
- Initial use cases that all agencies largely agree upon
- Plans for communication and collaboration across agencies in moving genomic medicine forward
- Needs and goals for interaction with possible international efforts