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Emerging Technology Platforms in Health Care

John Halamka, M.D.
President
Mayo Clinic Platform

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JOHN DEERE

A New Paradigm for Health care

Health Care 2020	Health Care 2030
Reactive	Preemptive
Symptom based	Molecular based
Corrective	Curative
Invasive	Minimally invasive
Heroic	Routine
Late stage	Early stage
Expensive	Affordable
De-personalized	Personalized
Slow	Fast
Complicated	Uncomplicated
Inconvenient	Convenient
In person	Accessible anywhere

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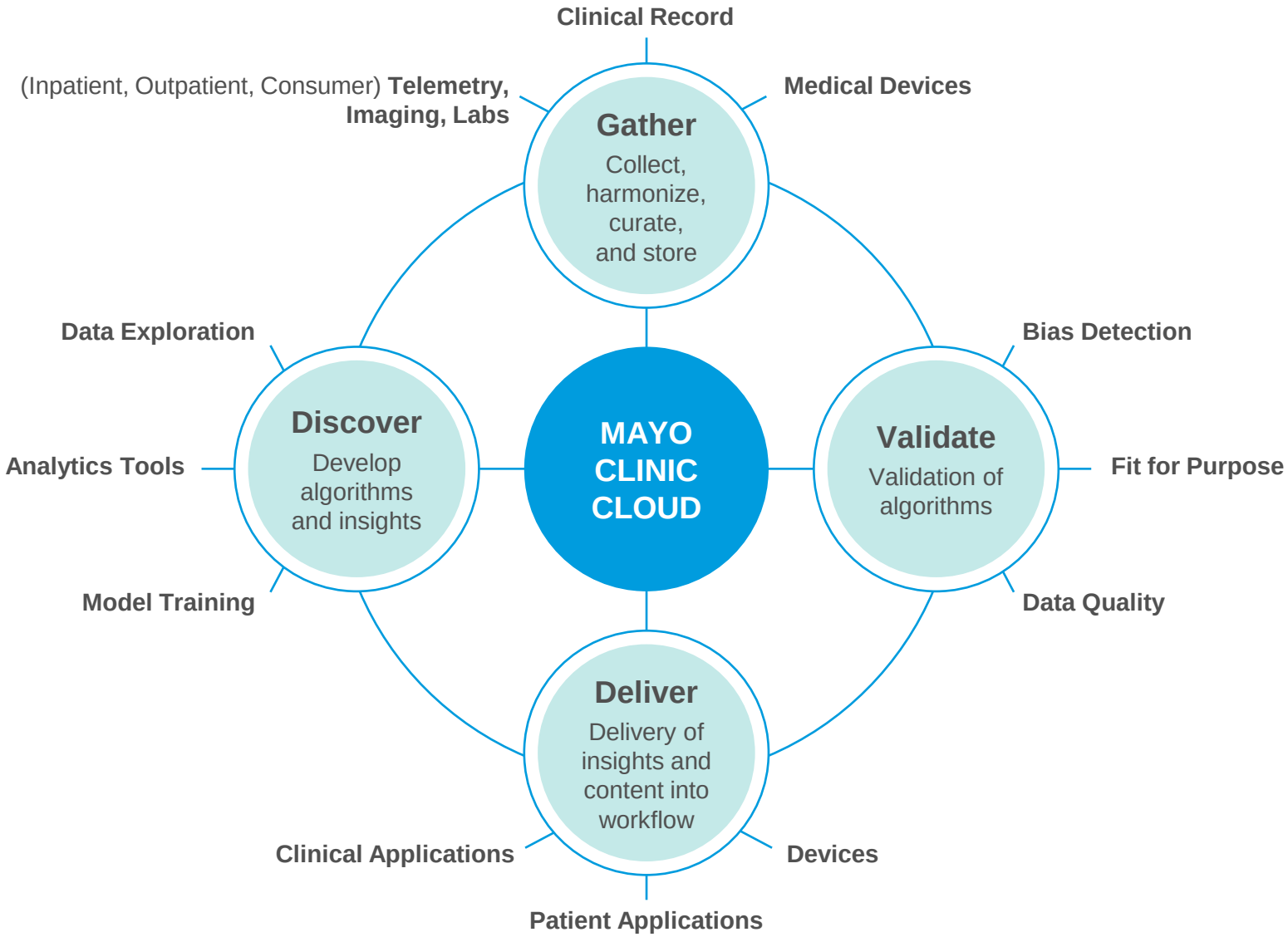

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PARTNERS

commure

ANUMANA

nference®

Medically Home

Google

SAFE

Lucem Health

k health

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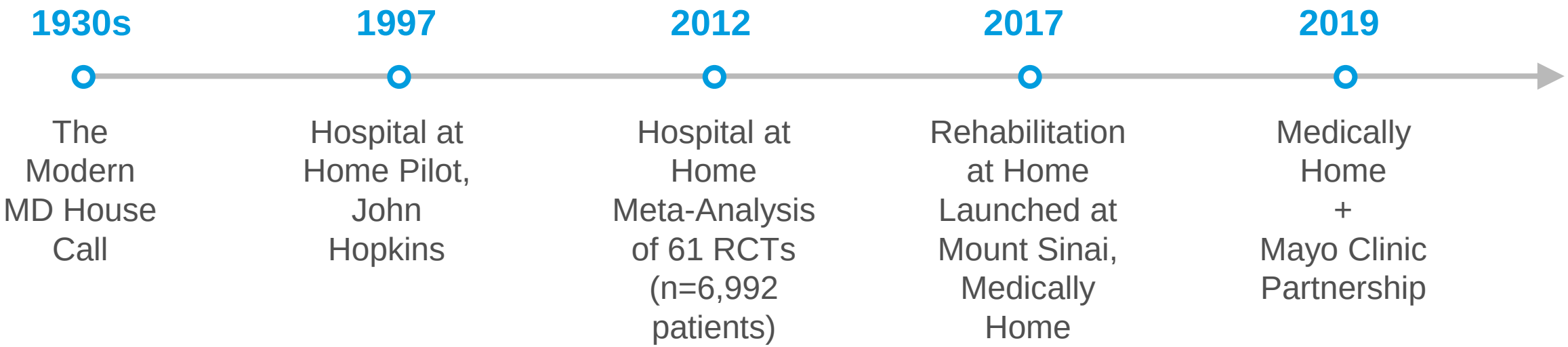
CASE STUDIES

- Cardiology – Anumana, Lucem
- Radiology – Body composition
- Radiation therapy – Autocontouring
- Oncology – Breast cancer
- Eradicating racism – CHANGE Healthcare analysis
- Virtual care – SAFE and Medically Home

HIGH ACUITY CARE IN THE HOME: A HISTORICAL PERSPECTIVE



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2012 META-ANALYSIS

- Meta-analysis of 61 HaH RCTs including n=6,992 patients age >16 yrs
- 19% reduction in mortality (p<0.05)
- 25% reduction in readmission (p<0.05)
- Significant reduction in cost
- Higher patient satisfaction

.[2]Caplain, GA, Sulaiman NS, Mangin DA, et al. A meta-analysis of "hospital in the home". MJA. 2012 197(9): 512-519.

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BARRIERS TO SCALING

- Care Model
- Financial Constraints
- Legal and Regulatory Landscape

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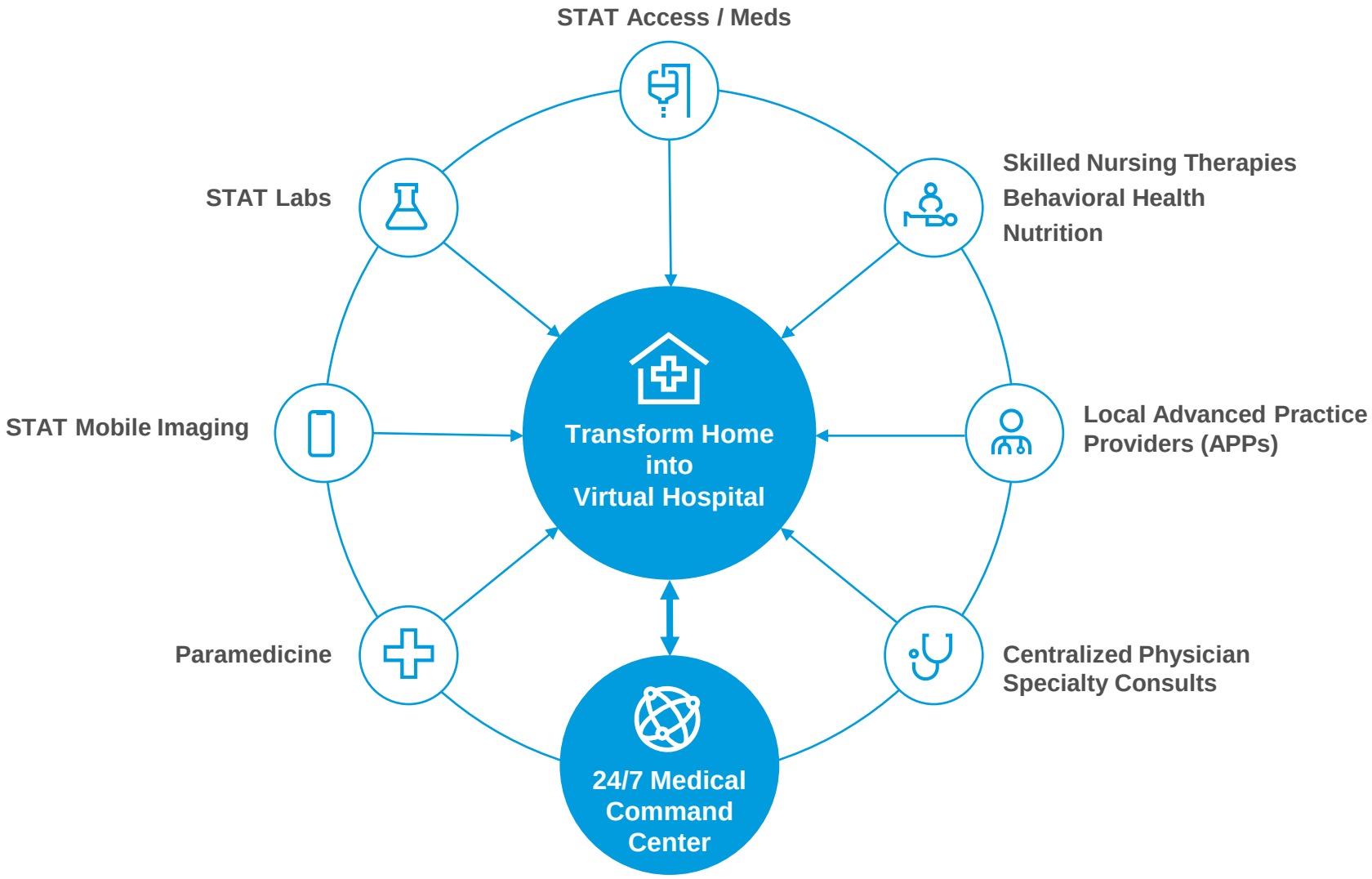
ADVANCED CARE AT HOME

ADVANCED CARE AT HOME ECOSYSTEM



Supported by a Technology Layer (software / hardware)

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DATA TRANSPARENCY

RadAbd

Summary

Machine learning-based decision support software to augment medical imaging-related diagnosis of abdominal CT scans

Type of algorithm employed

Convolutional neural network

Population composition

Ethnic composition	
Non-Hispanic White	**60**%
Hispanic and Latino	**18**%
Black or African American	**13**%
Asian	**6**%
Other	**3**%
Gender balance	
Male/Female	**55/45**%

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Thank You