Reducing Harmful Overuse of Cesarean Deliveries

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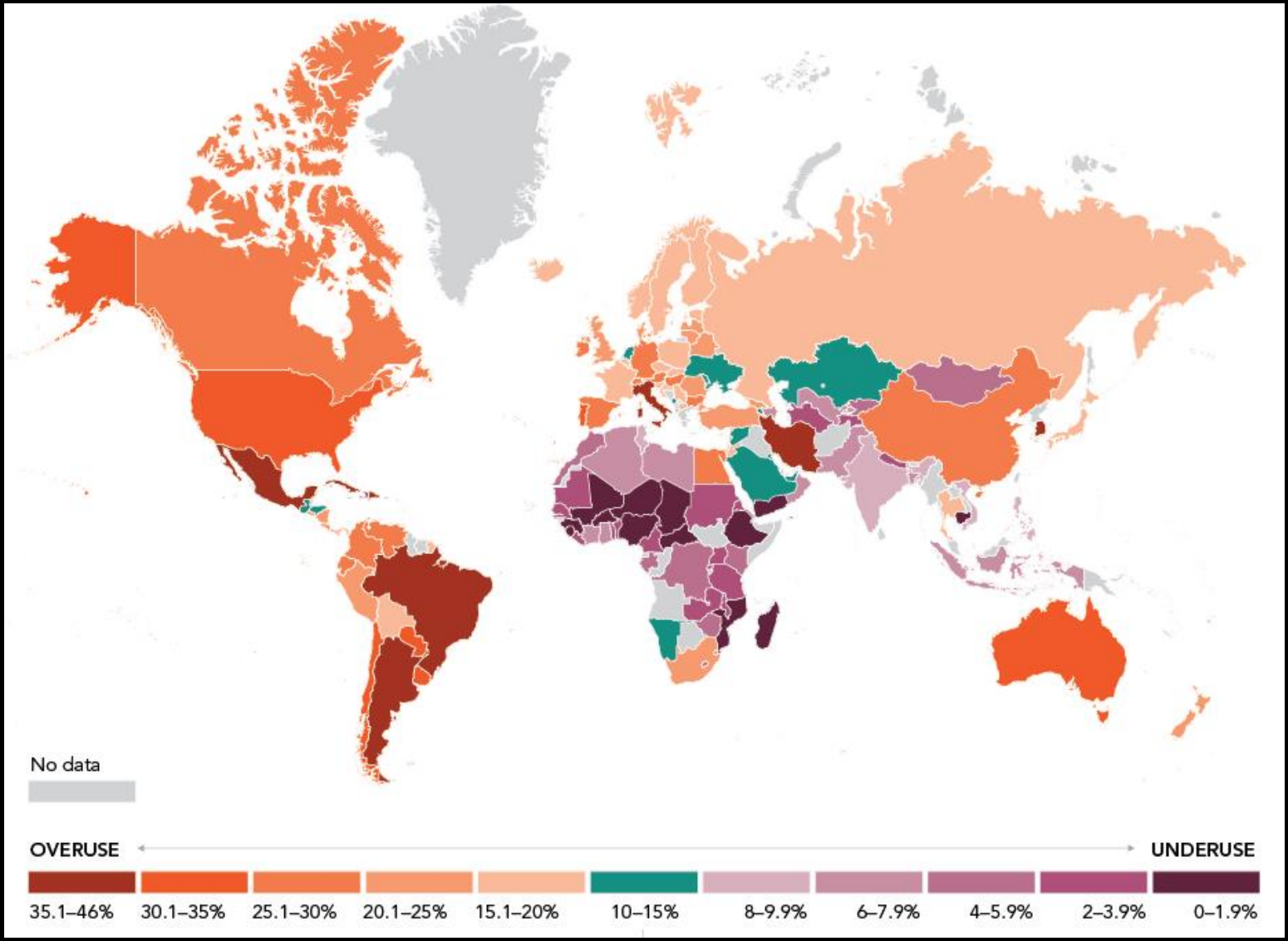
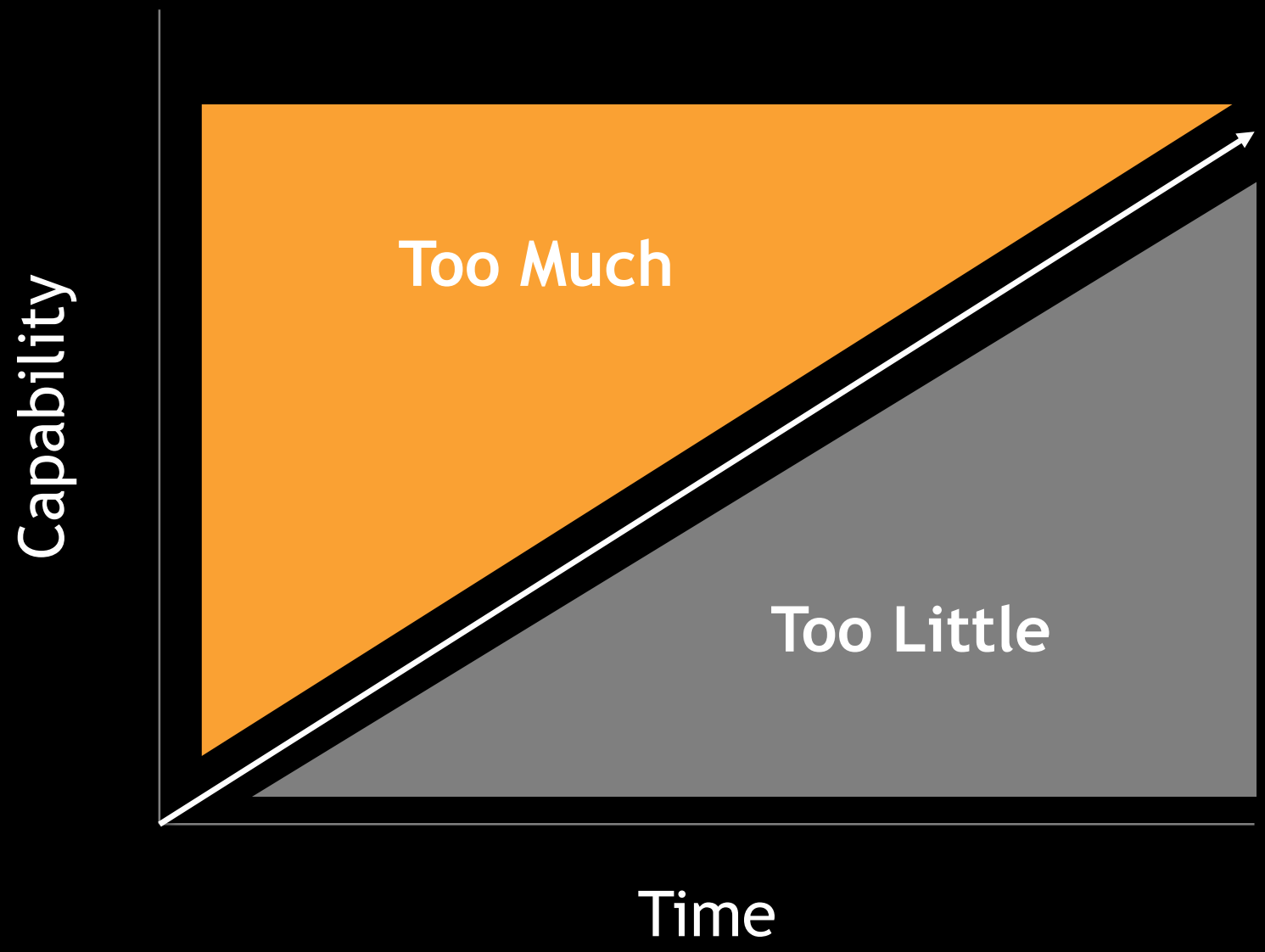
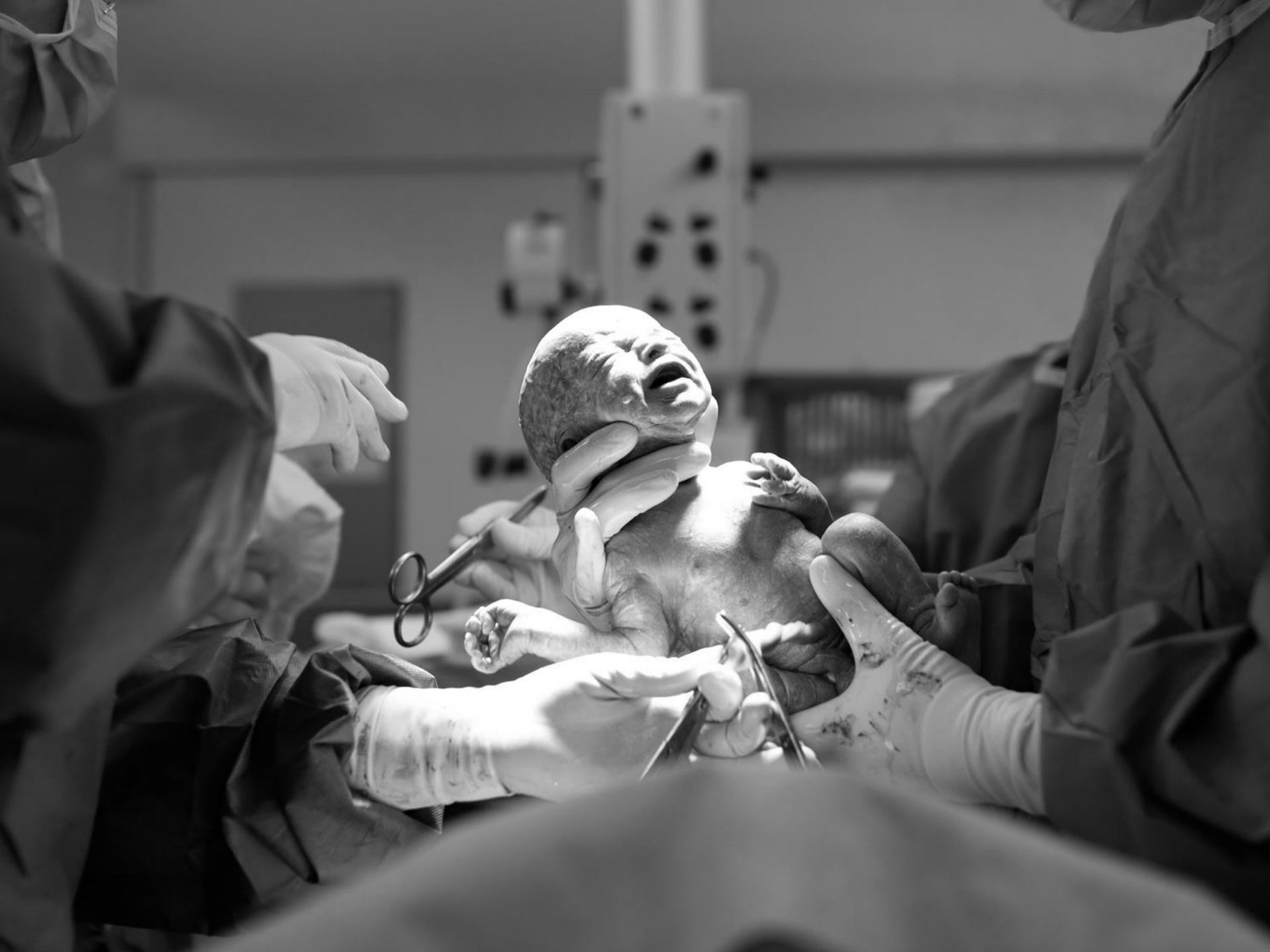
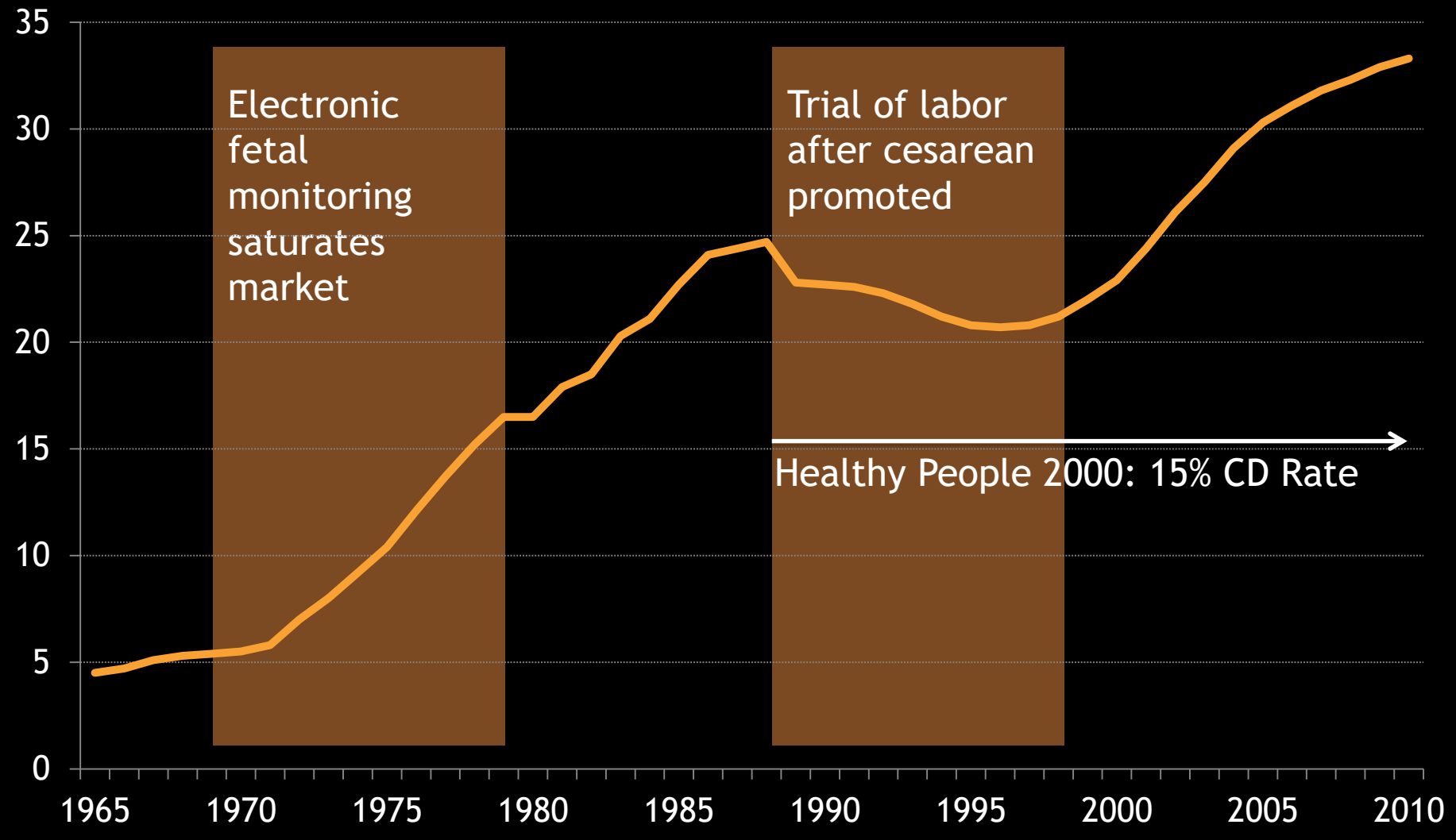

No data
OVERUSE
UNDERUSE
35.1–46%
30.1–35%
25.1–30%
20.1–25%
15.1–20%
10–15%
8–9.9%
6–7.9%
4–5.9%
2–3.9%
0–1.9%

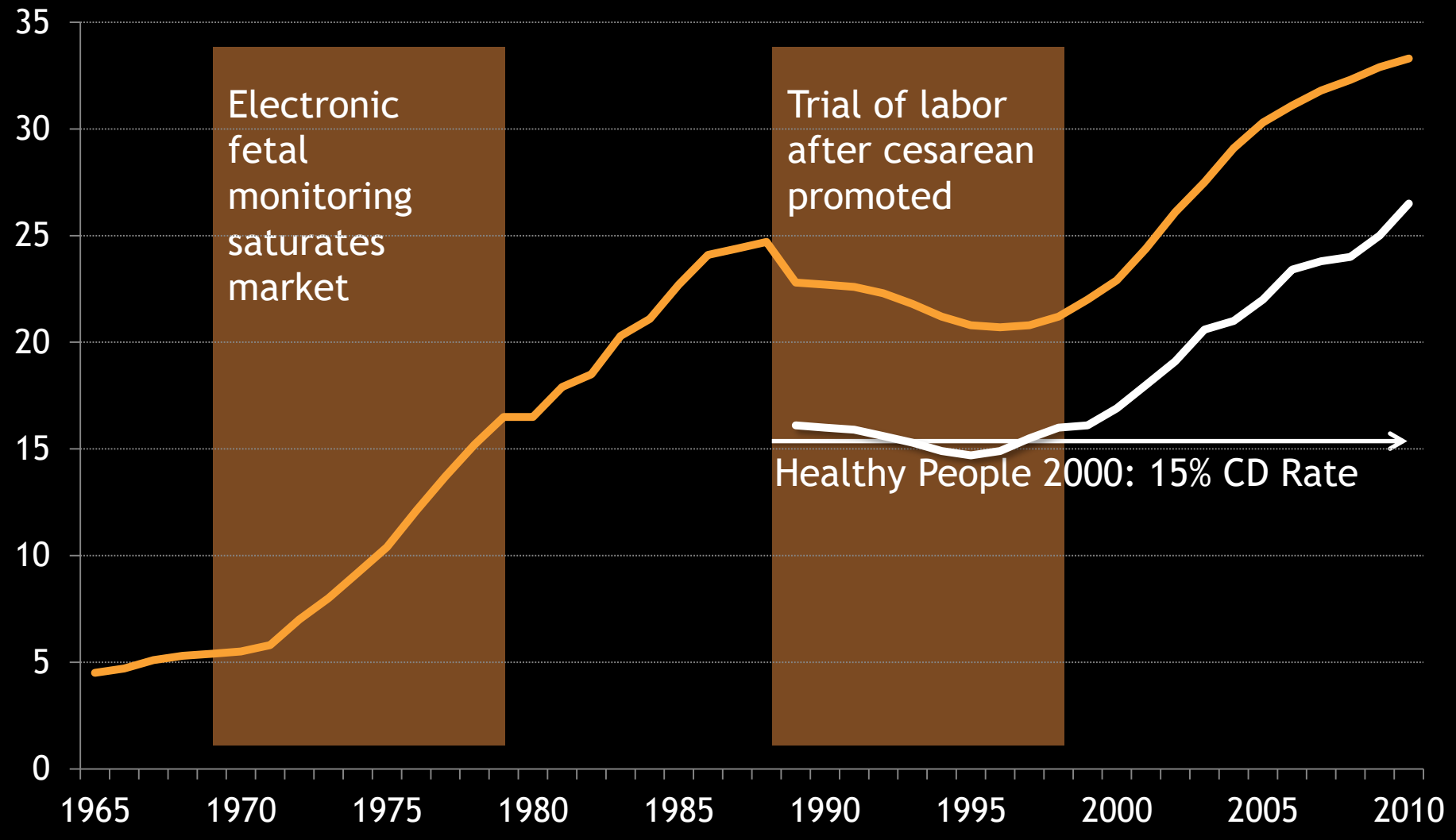

Capability
Too Much
Too Little
Time



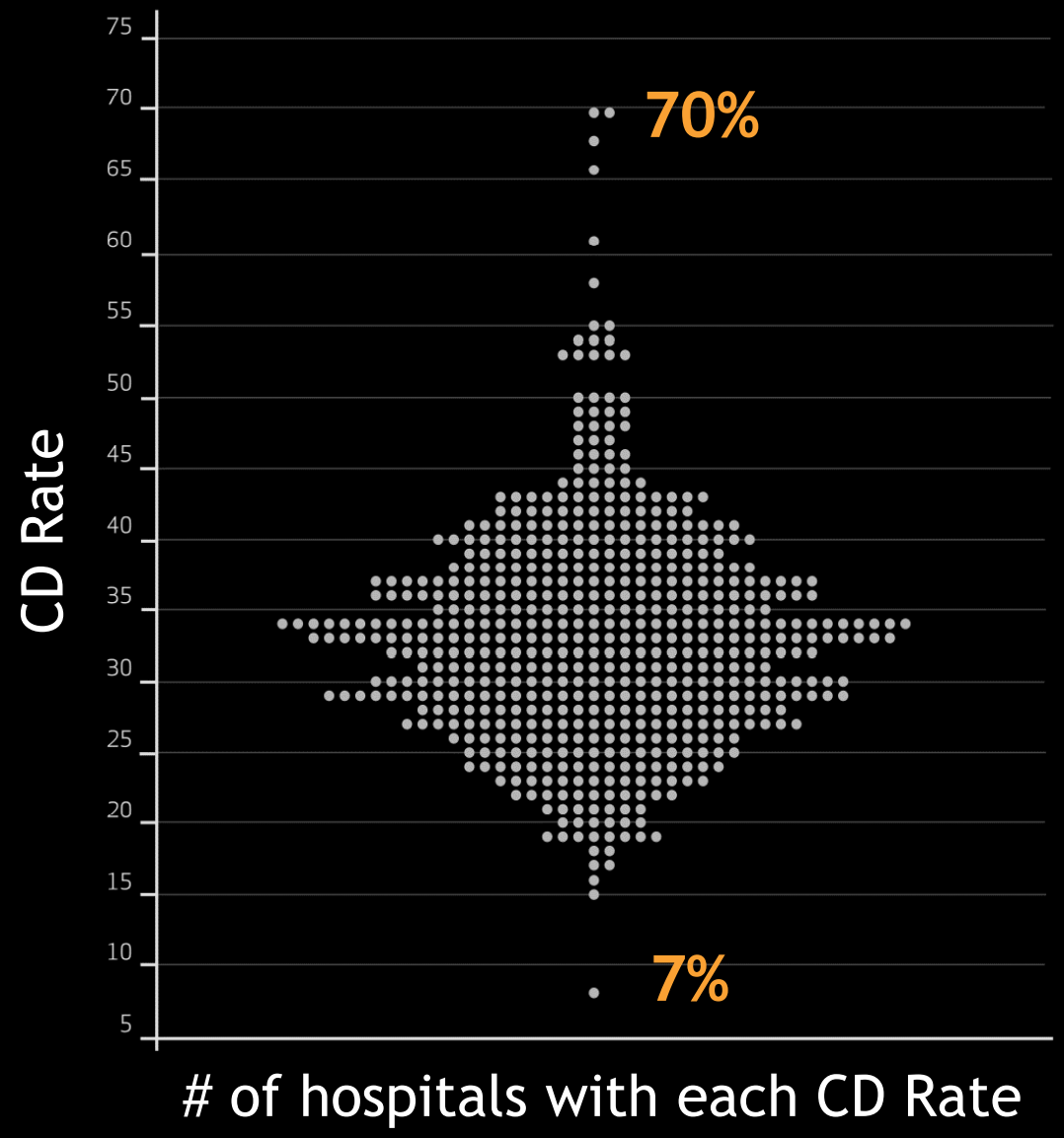
United States Cesarean Delivery Rate (%)



United States Cesarean Delivery Rate (%)



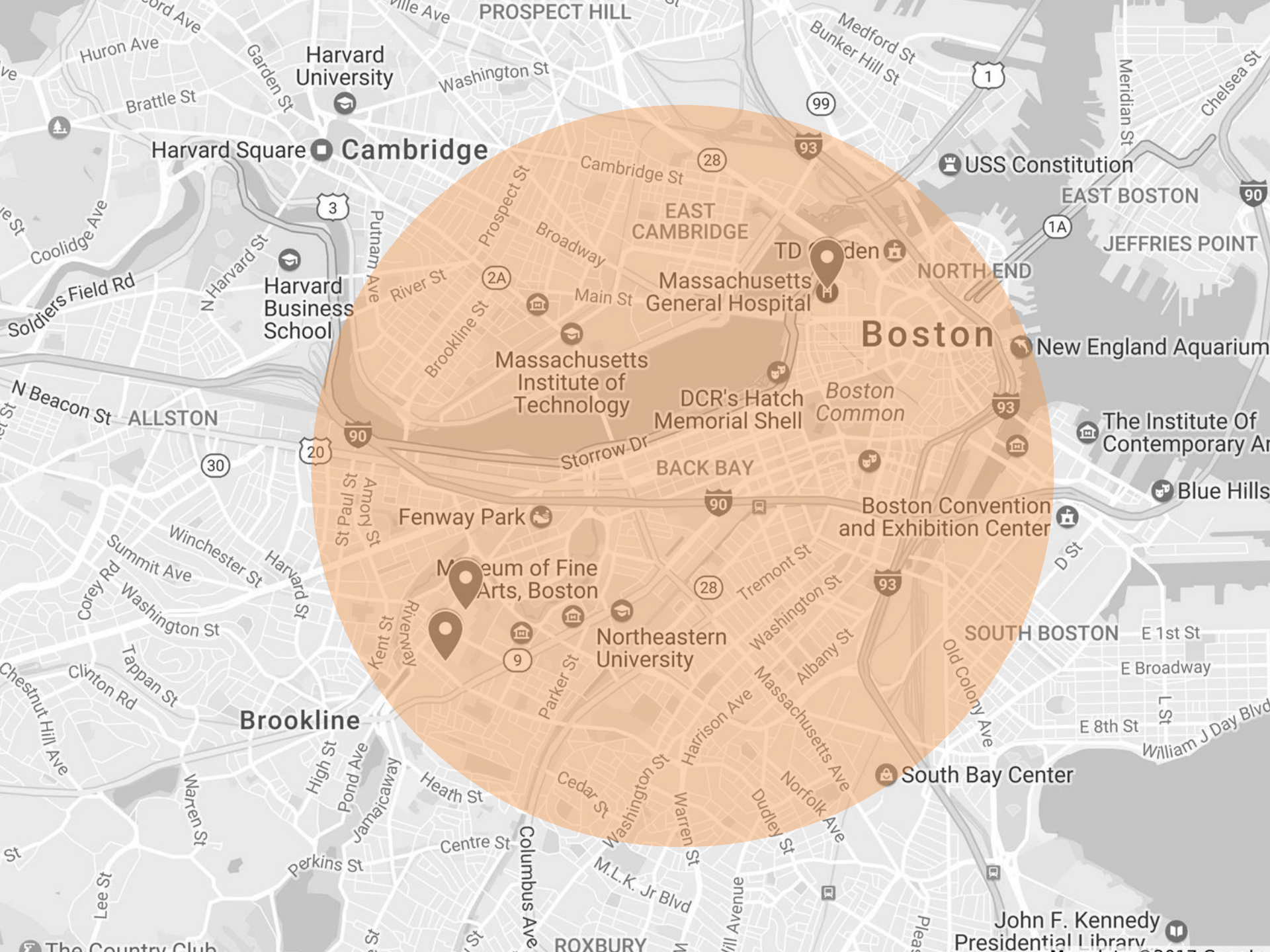
Cesarean Rates by Hospital Across the United States



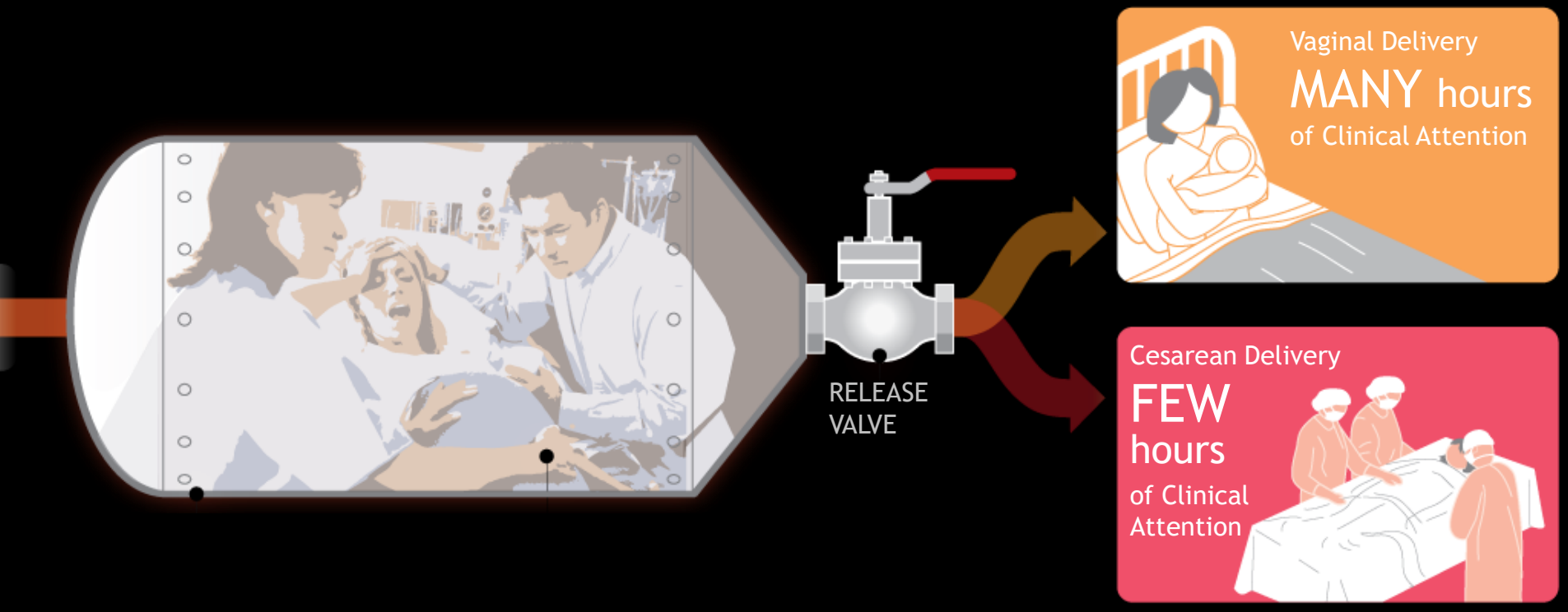
x 10


HOSPITAL ENTRANCE
The facility
is a risk factor


THANK YOU DOC

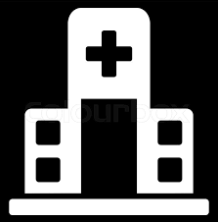

PROSPECT HILL
Huron Ave
Garden St
Harvard University
Washington St
Brattle St
Harvard Square
Cambridge
Coolidge Ave
Soldiers Field Rd
N Harvard St
Harvard Business School
Putnam Ave
Prospect St
Cambridge St
EAST CAMBRIDGE
Broadway
River St
Main St
Brookline St
Massachusetts General Hospital
TD Garden
Massachusetts Institute of Technology
DCR's Hatch Memorial Shell
Boston Common
Boston
New England Aquarium
NORTH END
EAST BOSTON
JEFFRIES POINT
USS Constitution
Medford St
Bunker Hill St
Meridian St
Chelsea St
N Beacon St
ALLSTON
Storrow Dr
BACK BAY
Fenway Park
St Paul St
Amory St
Boston Convention and Exhibition Center
The Institute Of Contemporary Ar
Blue Hills
Winchester St
Summit Ave
Harvard St
Corey Rd
Washington St
Museum of Fine Arts, Boston
Tremont St
Kent St
Riverway
Northeastern University
Parker St
Tappan St
Clinton Rd
Chestnut Hill Ave
Brookline
SOUTH BOSTON
E 1st St
E Broadway
Old Colony Ave
Albany St
Massachusetts Ave
Harrison Ave
E 8th St
L St
William J Day Blvd
South Bay Center
High St
Pond Ave
Jamaicaway
Heath St
Warren St
Cedar St
Dudley St
Norfolk Ave
Centre St
Perkins St
Lee St
Columbus Ave
M.L.K. Jr Blvd
ROXBURY
John F. Kennedy Presidential Library
The Country Club

Pressure Builds for a Delivery Decision



Inputs:

53 Hospitals

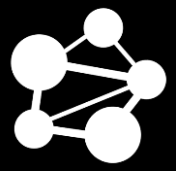


- Delivery Volume
- NICU Level
- Insurance Mix

220,000 Patients

- Age / Race
- Hypertension
- Diabetes

3 Management Areas



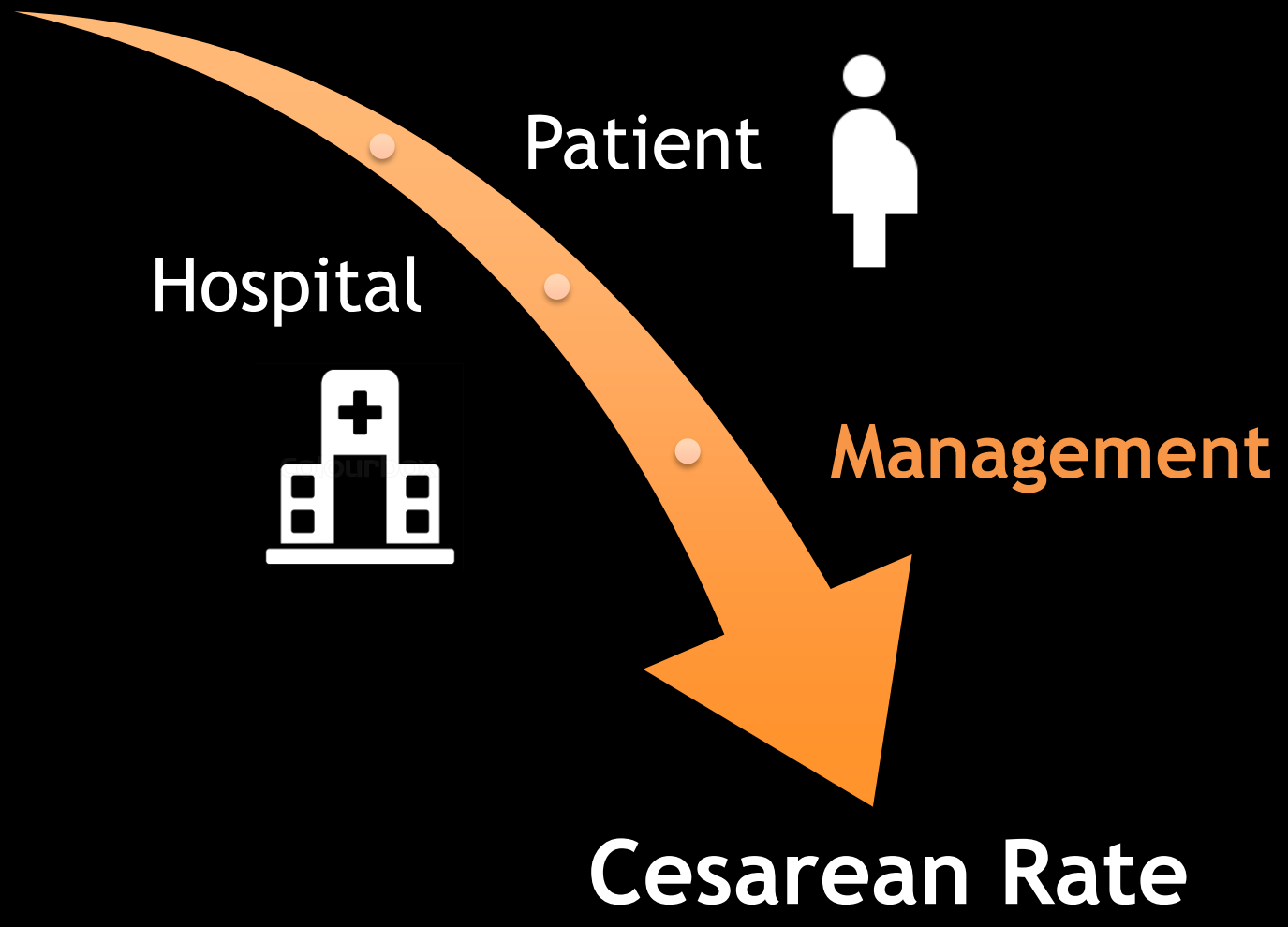
- Nursing
- Patient Flow
- Culture

Outputs:

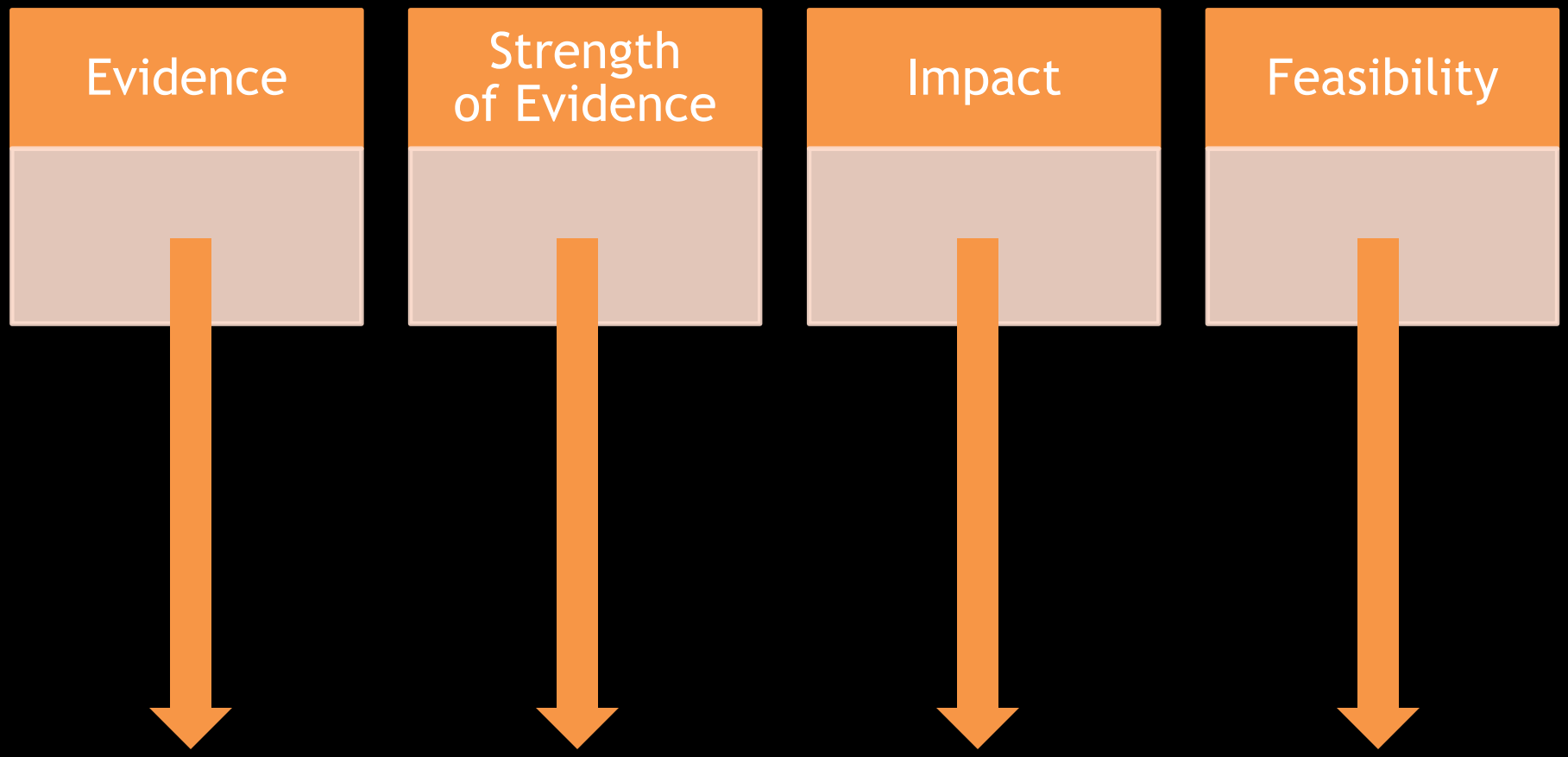
Cesarean Risk

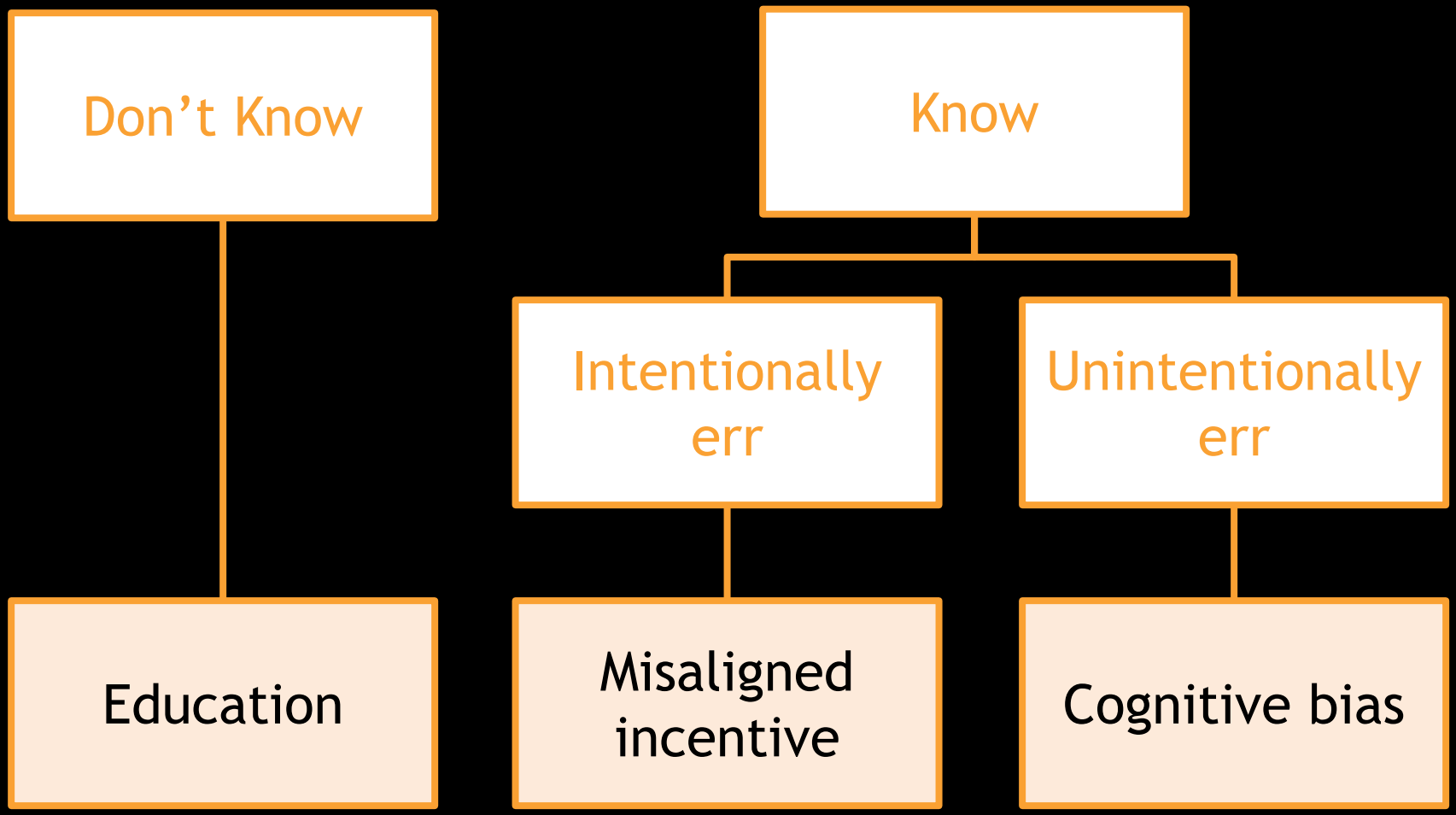
Morbidity Risk

Efficiency


Patient
Hospital
Management
Cesarean Rate

From Complexity to SIMPLE SOLUTIONS




Don’t Know
Know
Intentionally err
Unintentionally err
Education
Misaligned incentive
Cognitive bias

Prioritization Logic

1) **EVIDENCE –** clear direction?

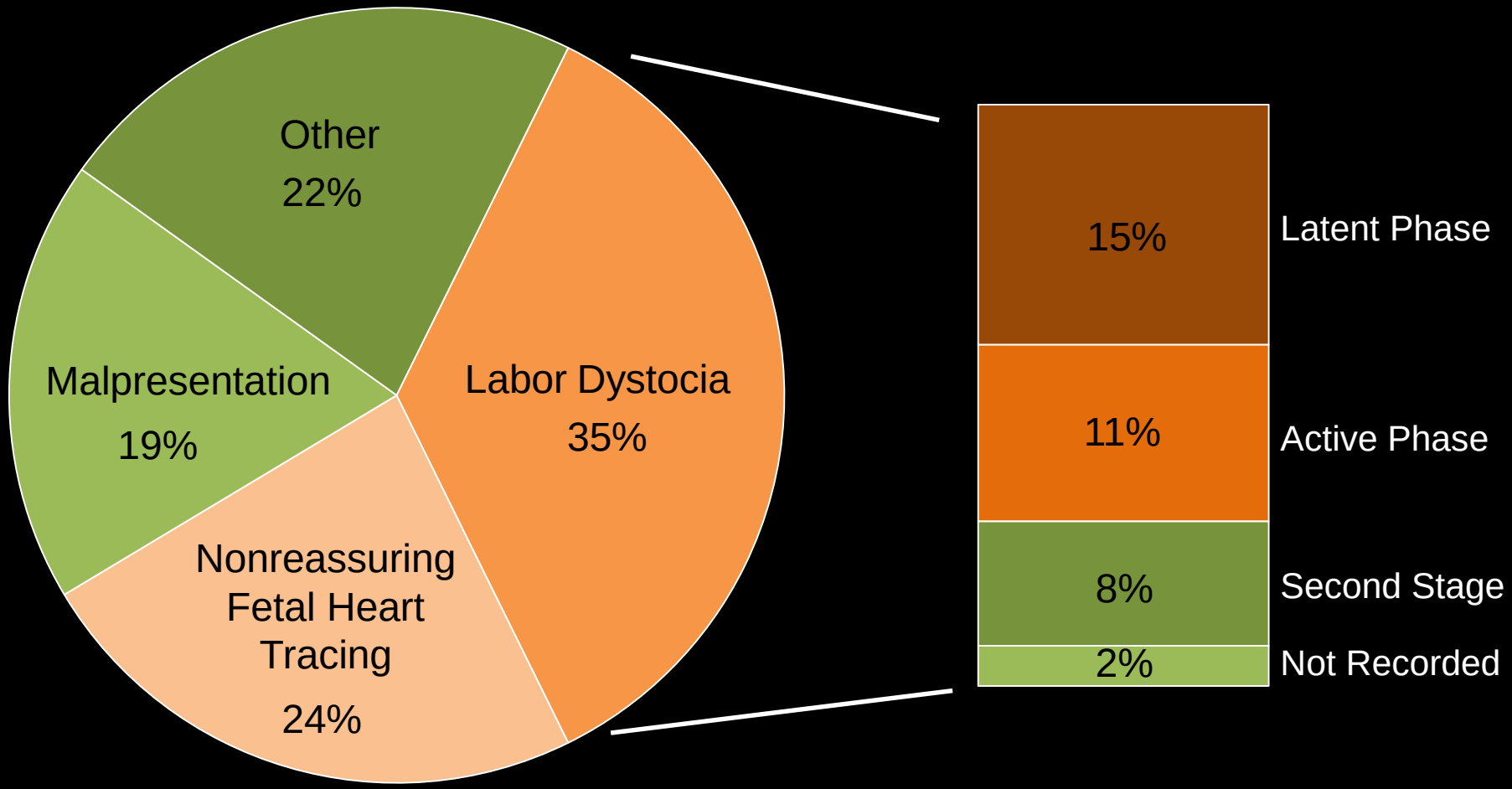
2) **IMPACT** – is there a large target and effect magnitude?

3) **SIMPLICITY -** can the strategy be translated into a solution that simplifies the decision options for end users?

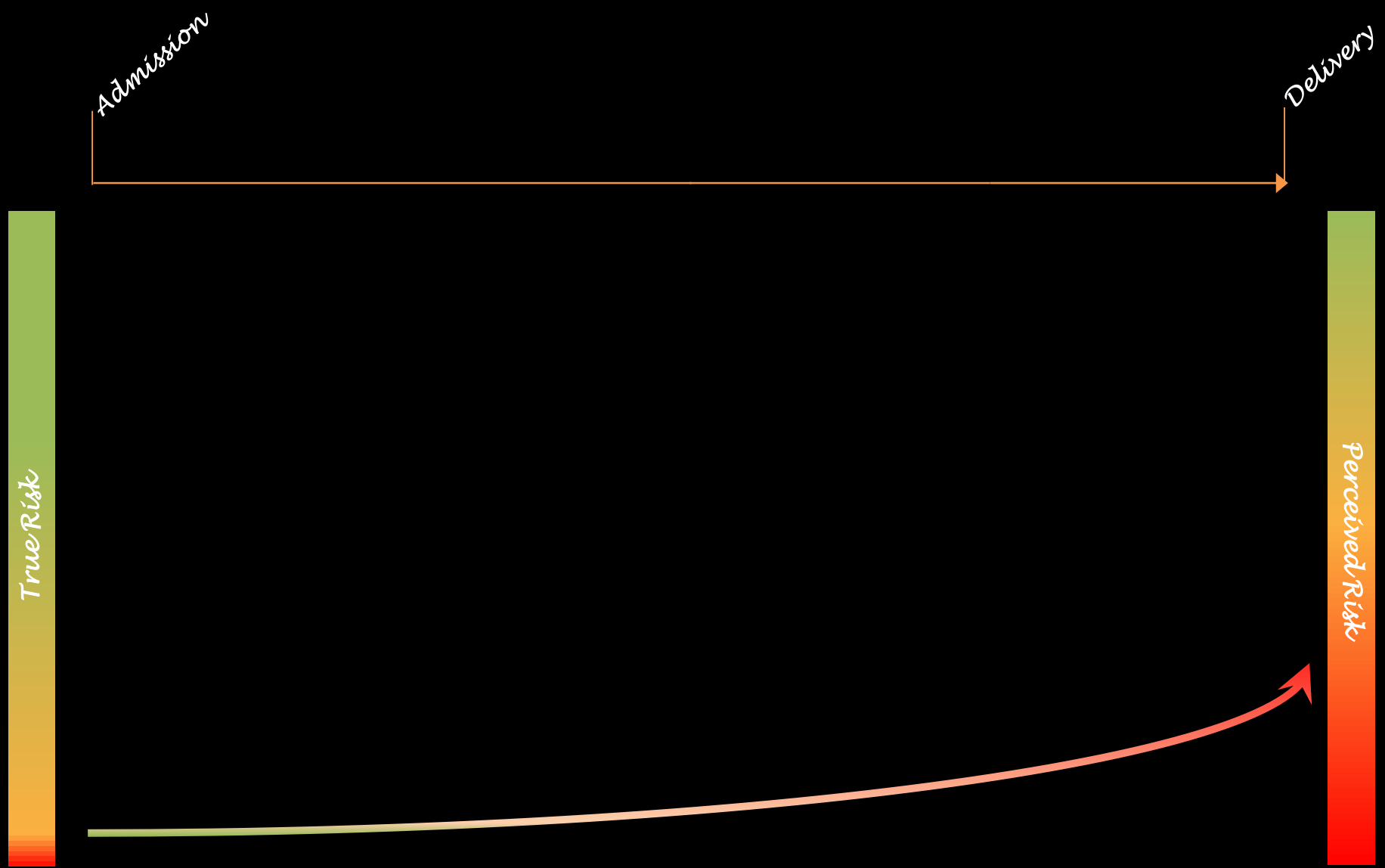
4) **SCALABILITY –** how much does implementation depend on context?

Category	Strategy	1) Evidence	2) Impact	3) Simplicity	4) Scalability
Primary Strategies	Limiting Labor Dystocia Cesareans in the Latent Phase				
	Limiting Labor Dystocia Cesareans in the Active Phase				
	Limiting Labor Dystocia Cesareans in the Second Stage				
	Delaying Admission for Spontaneous Labor				
Excluded Strategies	Restricting Elective Deliveries <41 Weeks				
	Requiring a Second Opinion for Intrapartum Cesareans				
	Increasing Use of Operative Vaginal Deliveries				
	Increasing Use of ECVs for Breech Presentation				
Adjacent Strategies	Increasing Use of Intermittent Auscultation				
	Improving Category II Fetal Heart Tracing Interpretation				

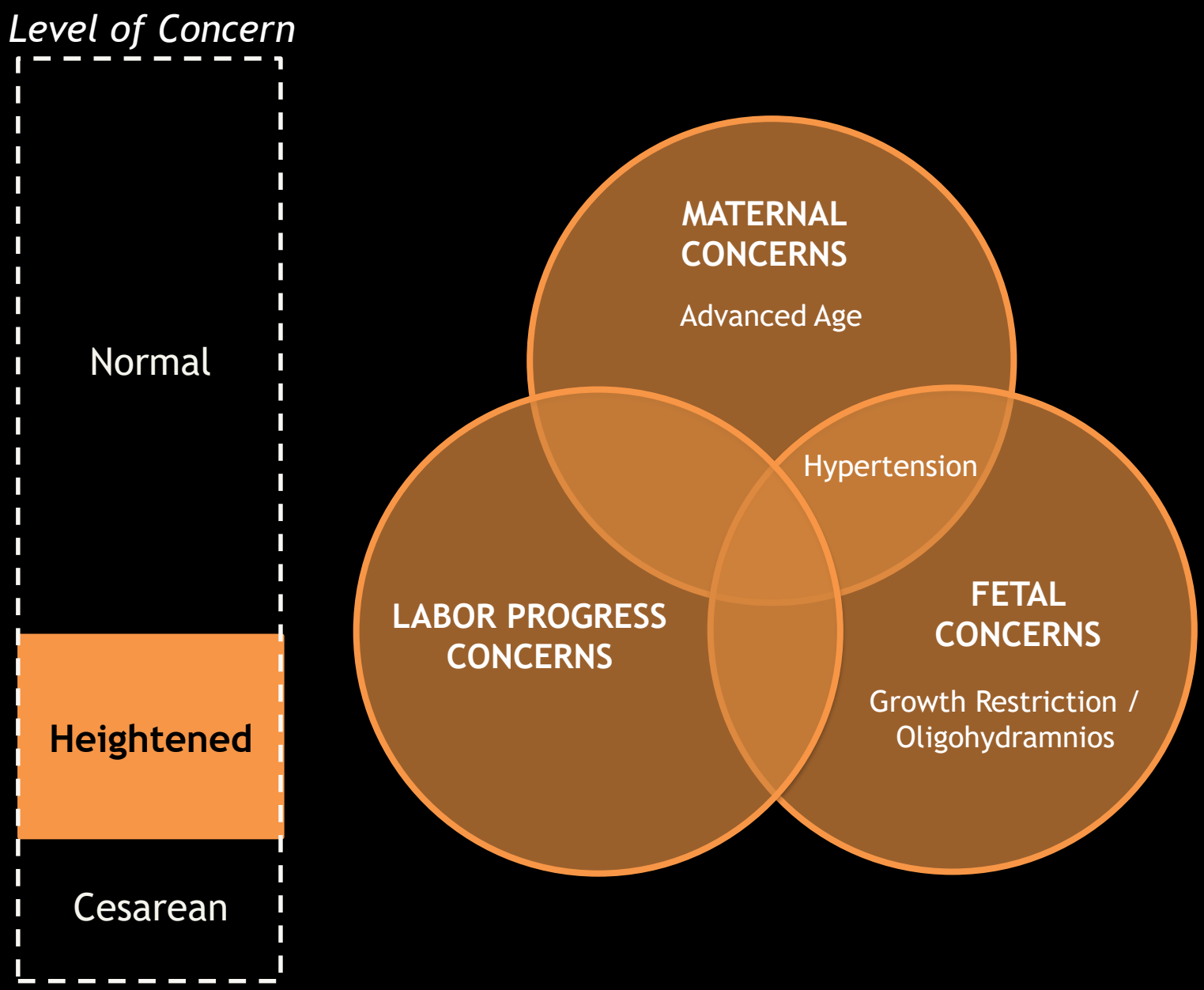
Indications for Primary Cesarean Deliveries



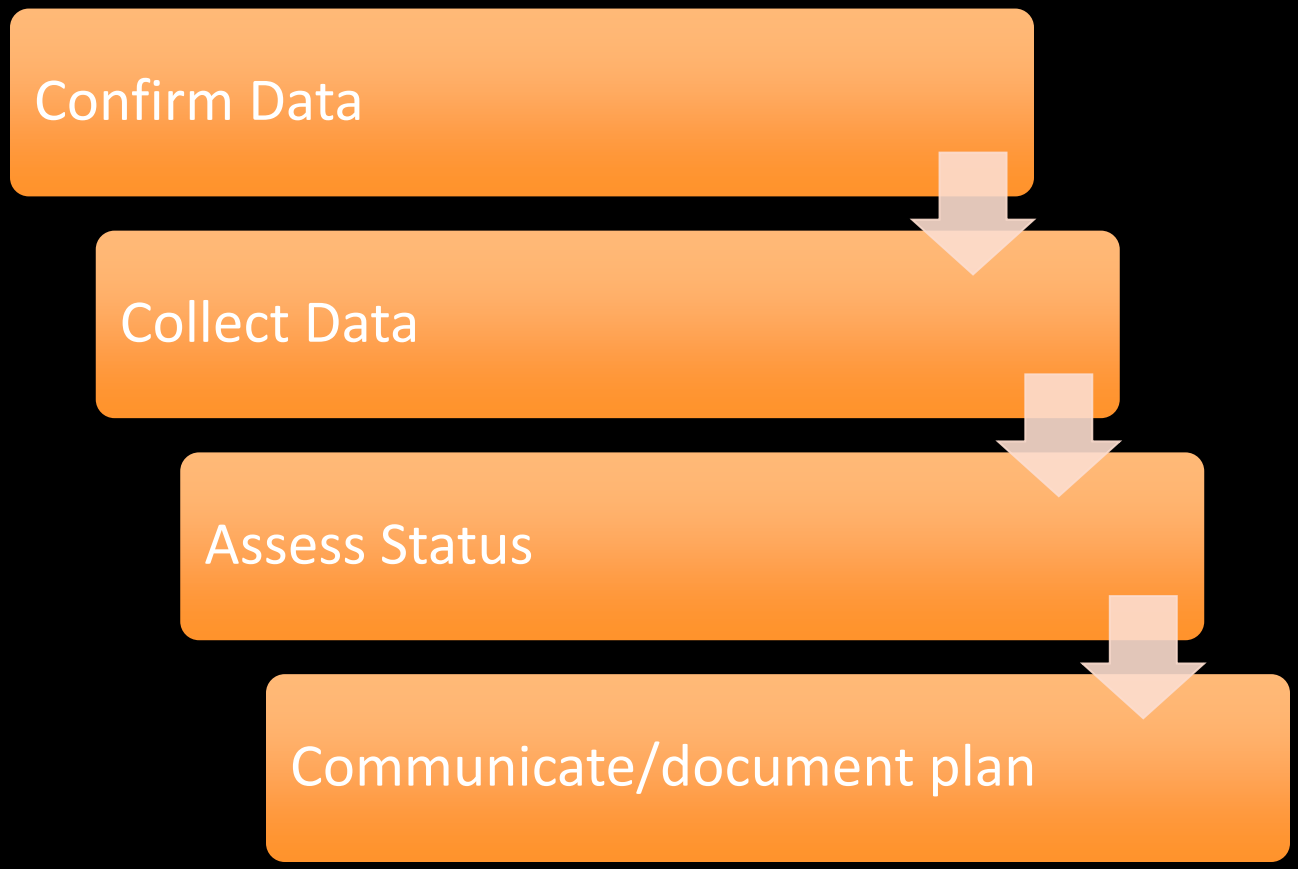
Risk Migration



Labels


Level of Concern
Normal
Heightened
Cesarean
MATERNAL CONCERNS
Advanced Age
Hypertension
LABOR PROGRESS CONCERNS
FETAL CONCERNS
Growth Restriction / Oligohydramnios

What content should every labor assessment ideally



ARIADNE LABS

Beth Israel Deaconess Medical Center