

Quality Performance Measures in Cardiology: What are they and how are we doing in Rhode Island?

Peter Tilkemeier, MD, FACC

Interim Director, Cardiology Division
Rhode Island and The Miriam Hospitals
The Warren Alpert Medical School
of Brown University

Quality Definition

- Insurer/payor
 - CMS
 - Insurance company
- Care provider
 - Hospital
 - Group
 - Physician/LIP

Definition

- Process based
- Outcomes based
- Guideline driven
 - Level of data supporting the guideline

Sources of Information

- Public domain
 - CMS data
 - www.Hospitalcompare.org
 - www.Whynotthebest.org
 - National registries
 - ACC - NCDR, Carotid stenting, Pinnacle
- Private domain
 - PQRI
 - United Health Care – Premium Physician Designation

Information Pitfalls

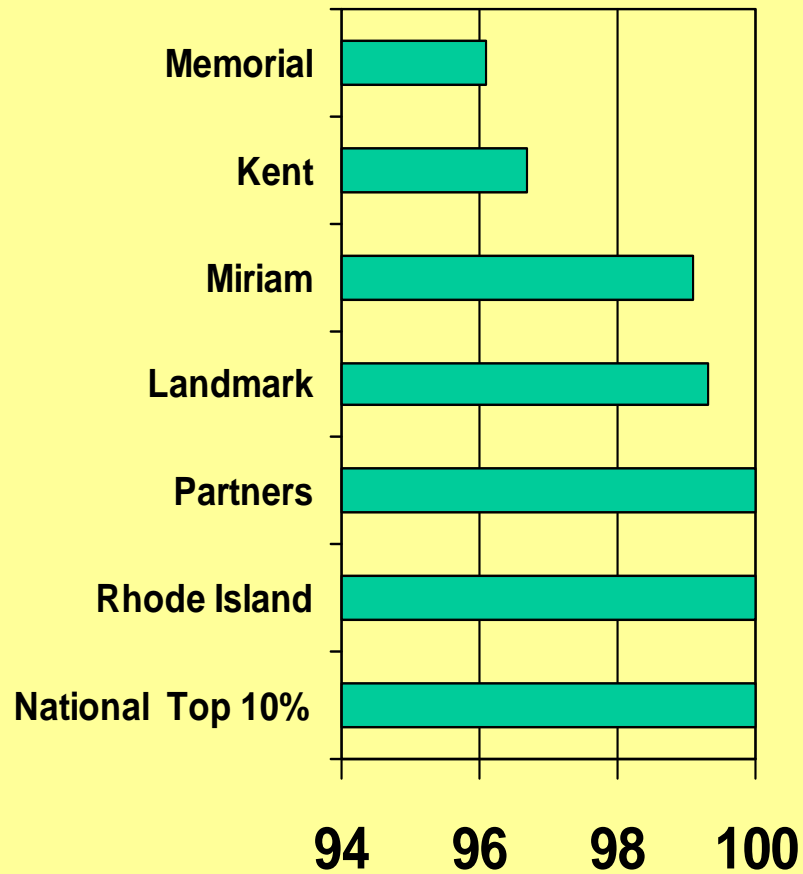
- Only as good as what is reported
 - Co-morbid conditions
 - Risk adjustment
- Understand the numerator and the denominator for the indicator
- Influence of small volume centers on outcomes

Public Indicators

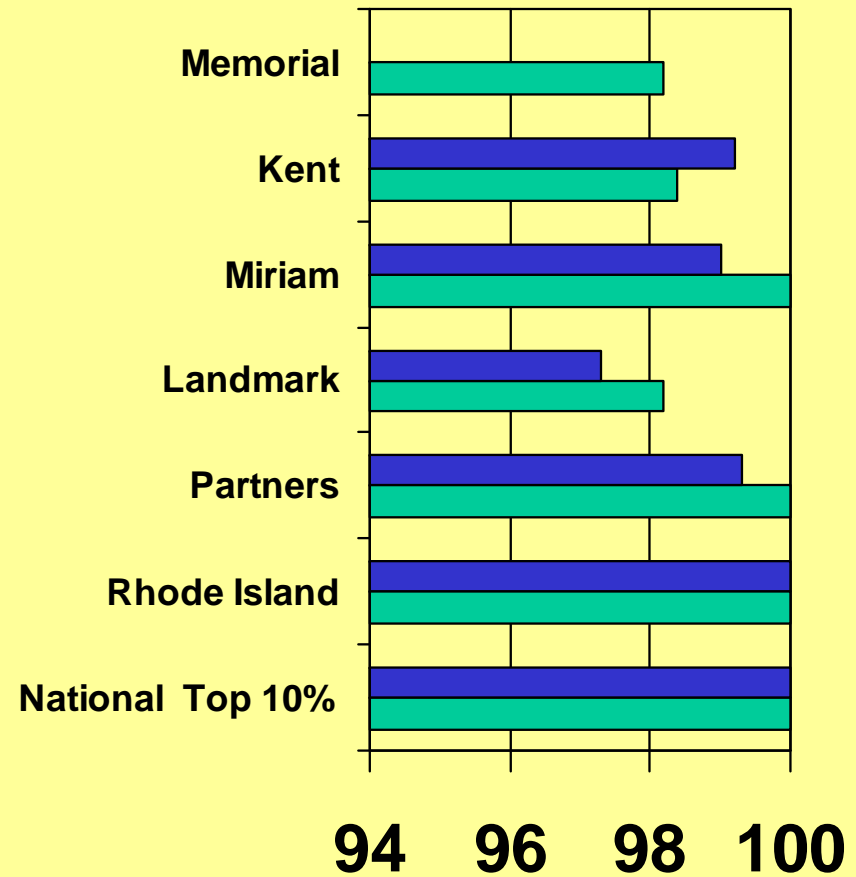
- MI
 - Smoking Cessation
 - ASA on admission
 - Discharge meds
 - Aspirin
 - Beta blockers
 - ACE/ARB for LV dysfunction
 - Door to balloon time
 - 30 day mortality
 - 30 day readmits
 - Composite score
- CHF
 - ACE/ARB for LV dysfunction
 - Smoking cessation
 - Assess LV dysfunction
 - Discharge instructions
 - 30 day mortality
 - 30 day readmits
 - Composite score

MI Indicators

ASA at Arrival



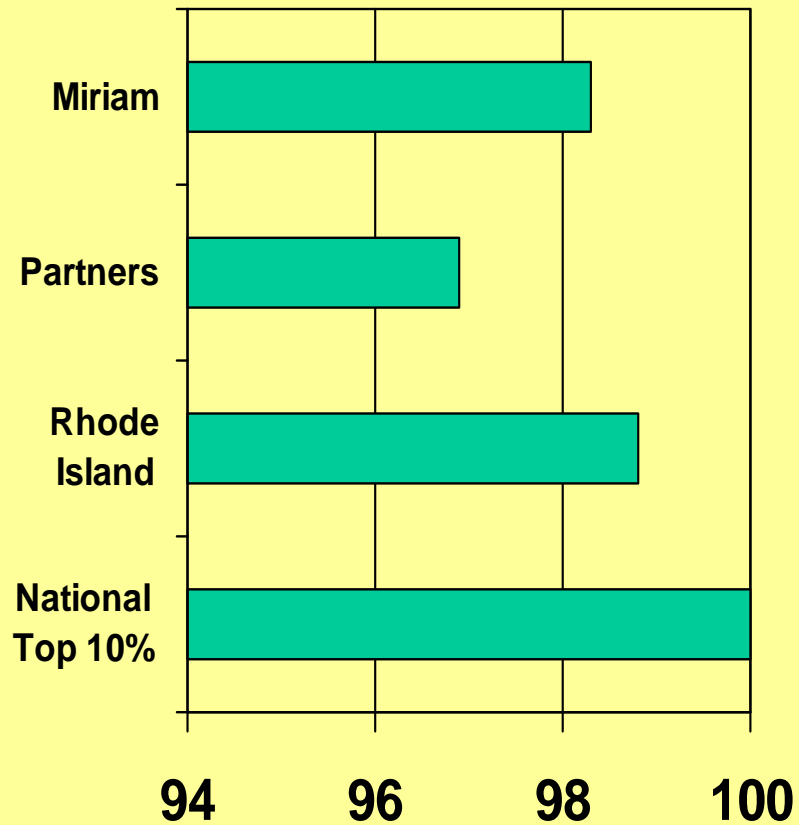
Discharge Medications



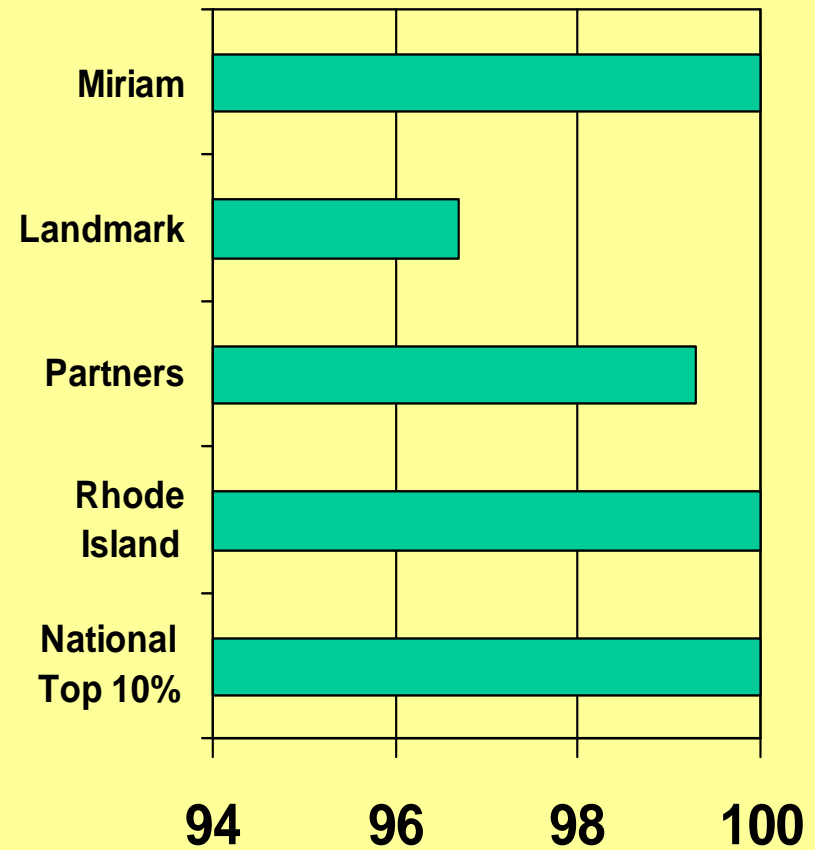
ASA Beta-blocker

MI Indicators

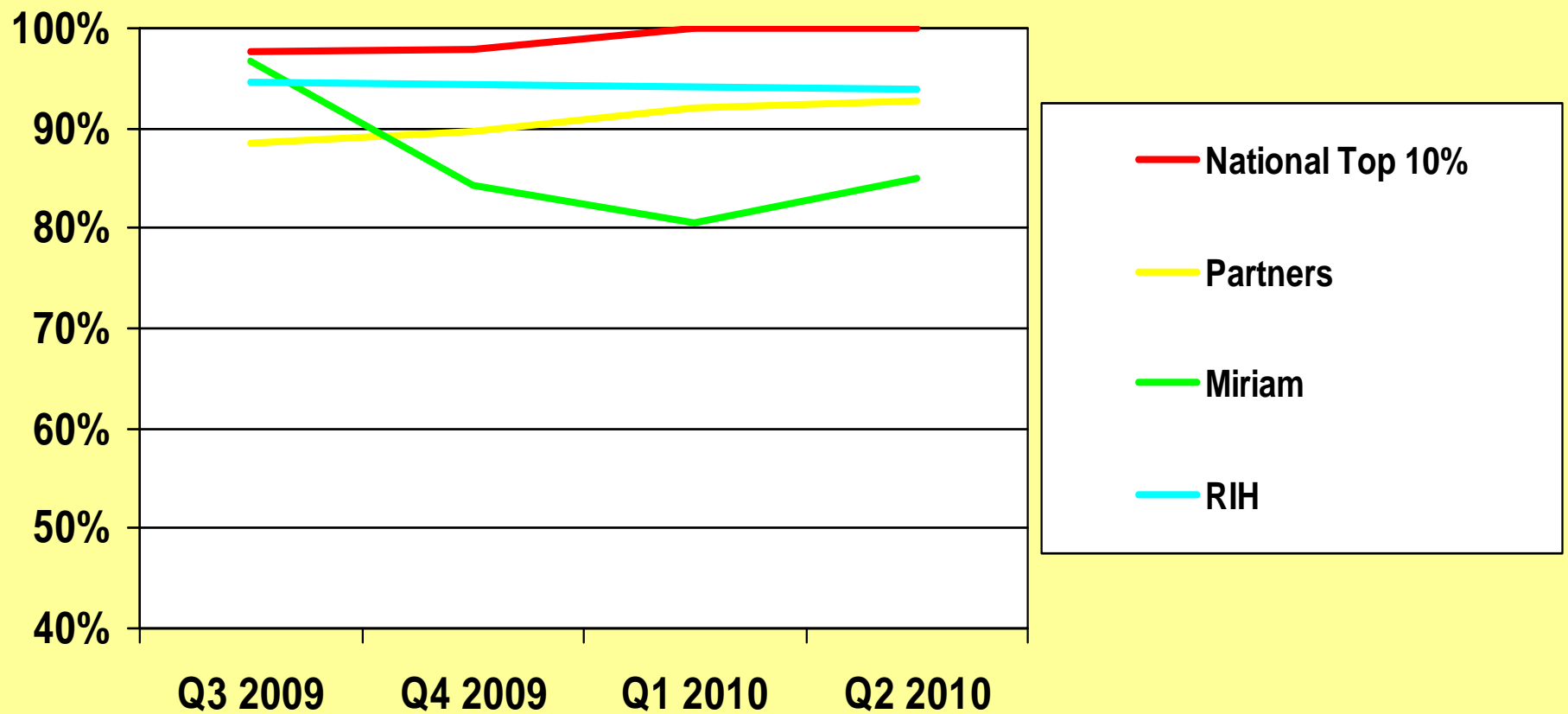
ACE or ARB at Discharge



Smoking Cessation



Door to Balloon <90 minutes

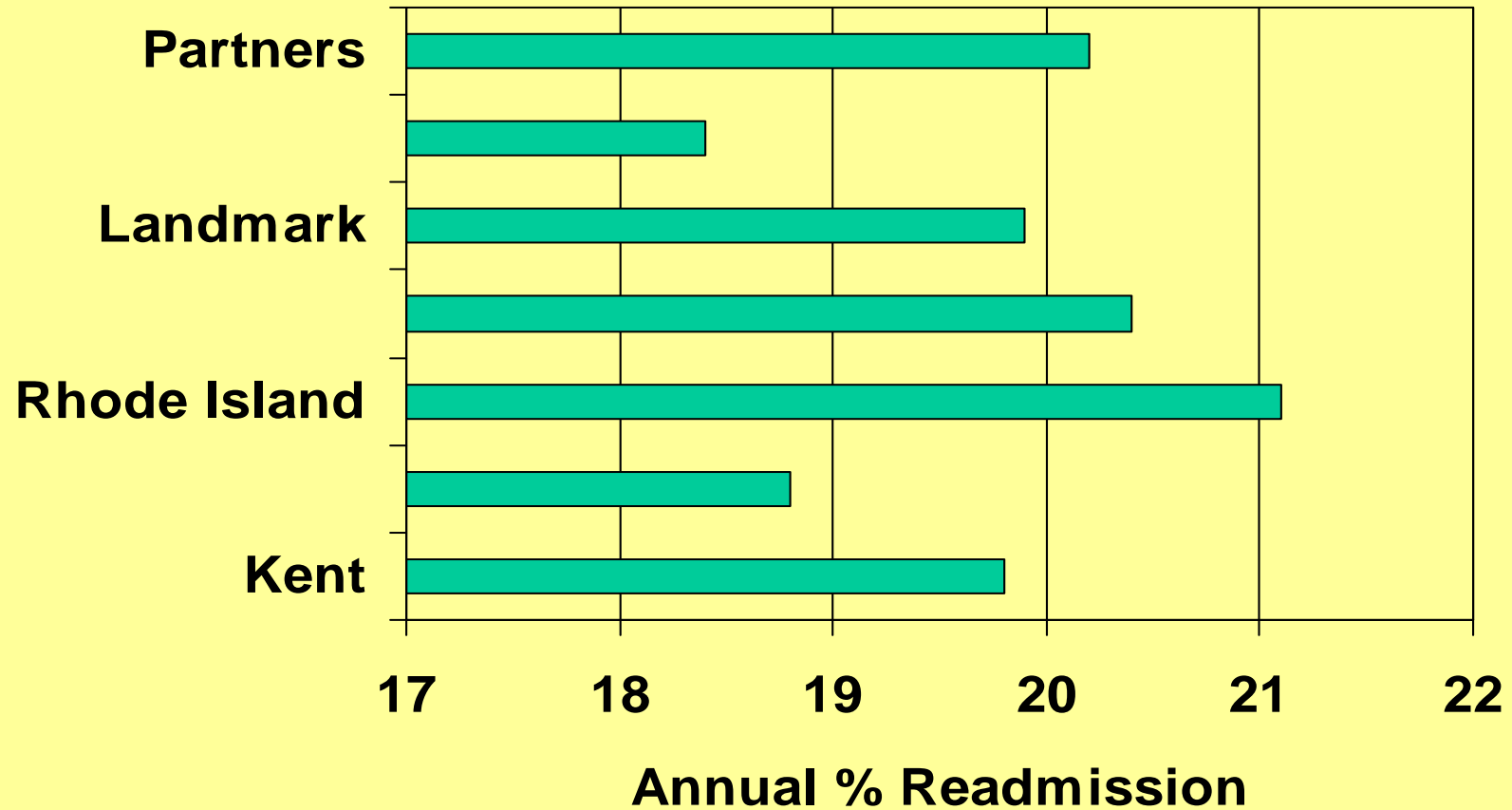


MI Mortality Data AHRQ

| | Observed | Expected | O/E ratio |
|---------------------|-----------------|-----------------|------------------|
| Kent | 8.8 | 4.8 | 1.83 |
| Miriam | 4.1 | 5.8 | 0.71 |
| Rhode Island | 5.3 | 5.9 | 0.89 |
| Memorial | 14.7 | 8.0 | 1.84 |
| Landmark | 11.8 | 9.9 | 1.19 |

Mortality rate unchanged for last 5 years data

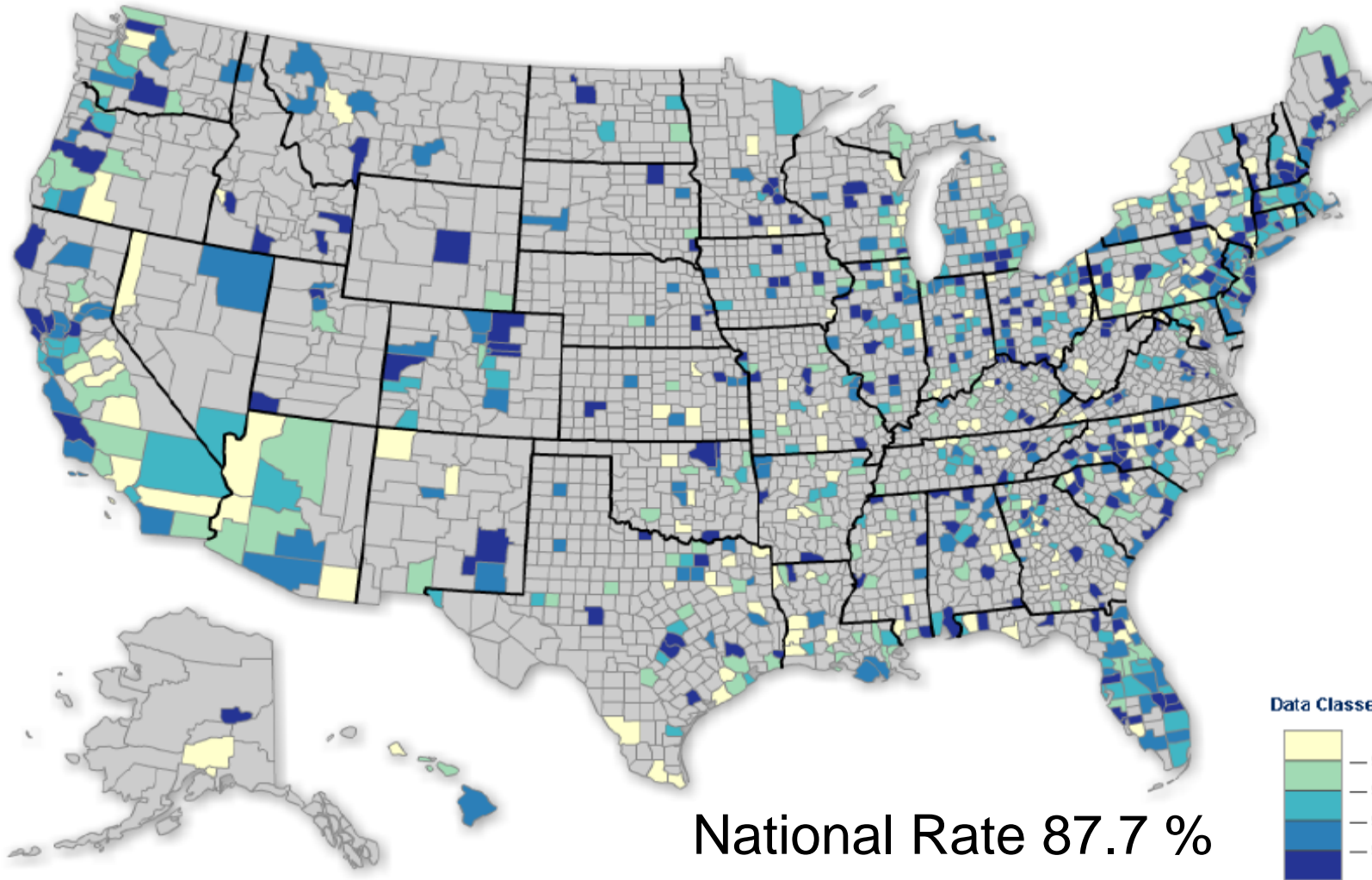
MI Readmission Data



Readmission rate unchanged for last 5 years data

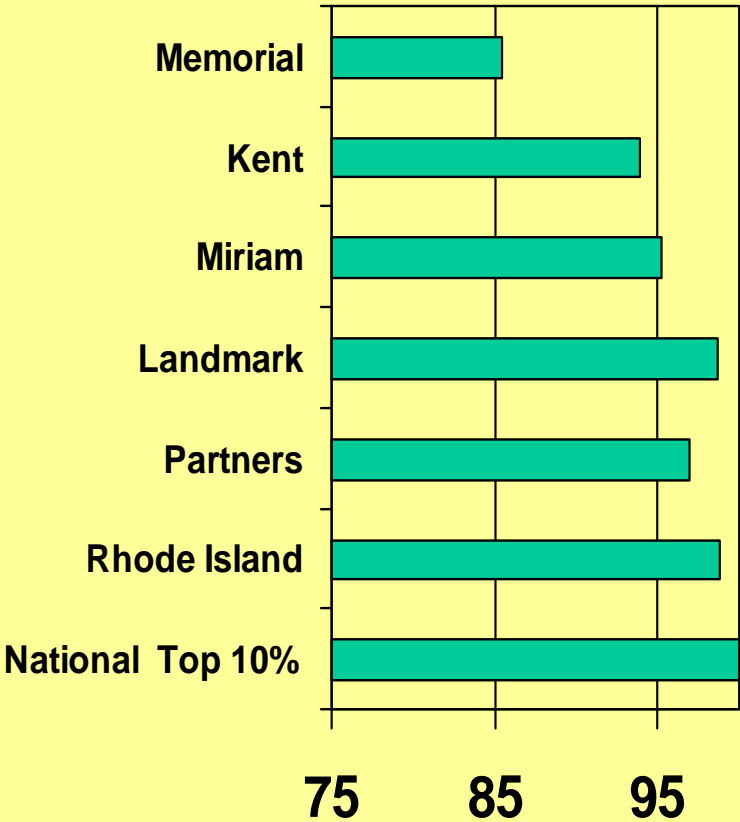
Composite MI

Reporting Date Range: 2009-10-01 to 2010-09-30

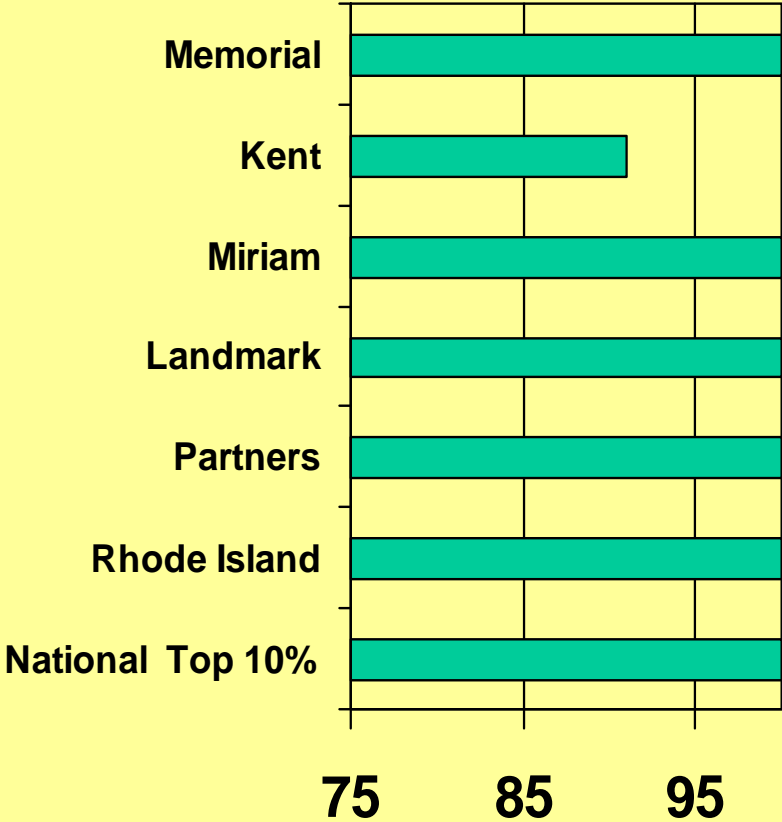


CHF Indicators

ACE or ARB at Discharge

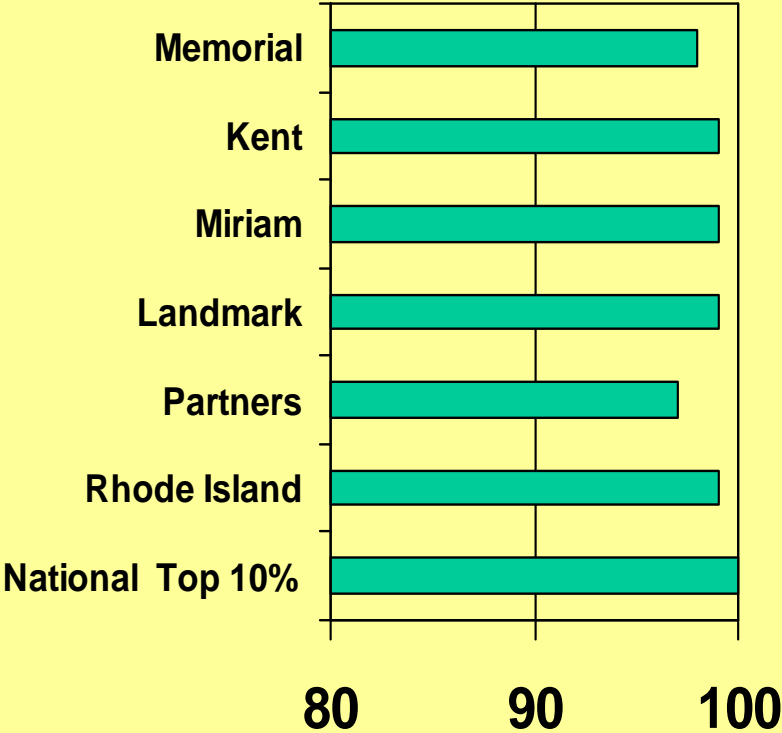


Smoking Cessation

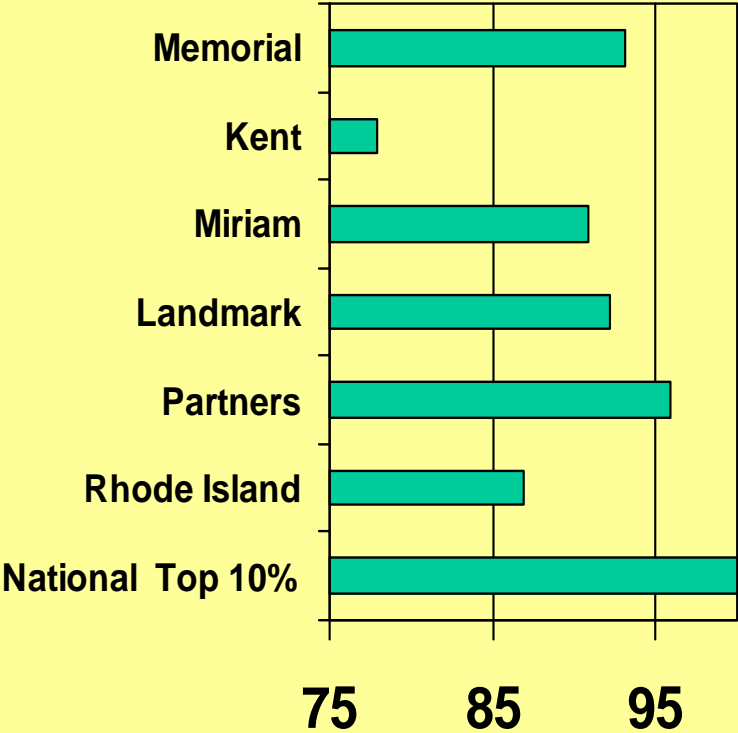


CHF Indicators

Assess LV Dysfunction



Discharge Instructions

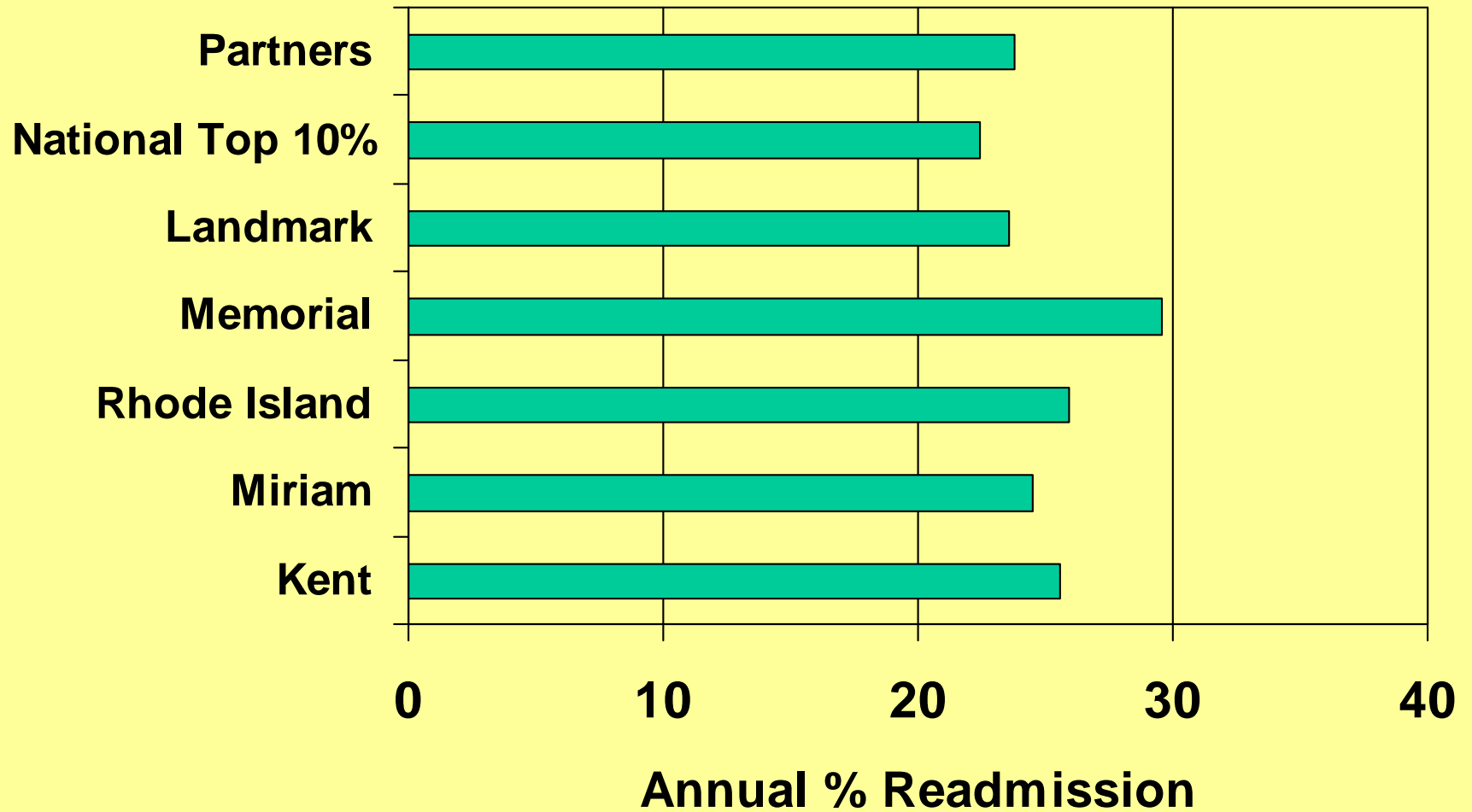


CHF Mortality Data AHRQ

| | Observed | Expected | O/E ratio |
|---------------------|-----------------|-----------------|------------------|
| Kent | 3.67 | 3.18 | 1.15 |
| Miriam | 2.5 | 2.15 | 1.16 |
| Rhode Island | 3.0 | 2.35 | 1.28 |
| Memorial | 3.5 | 2.77 | 1.26 |
| Landmark | 4.05 | 3.23 | 1.25 |

Mortality rate unchanged for last 5 years data

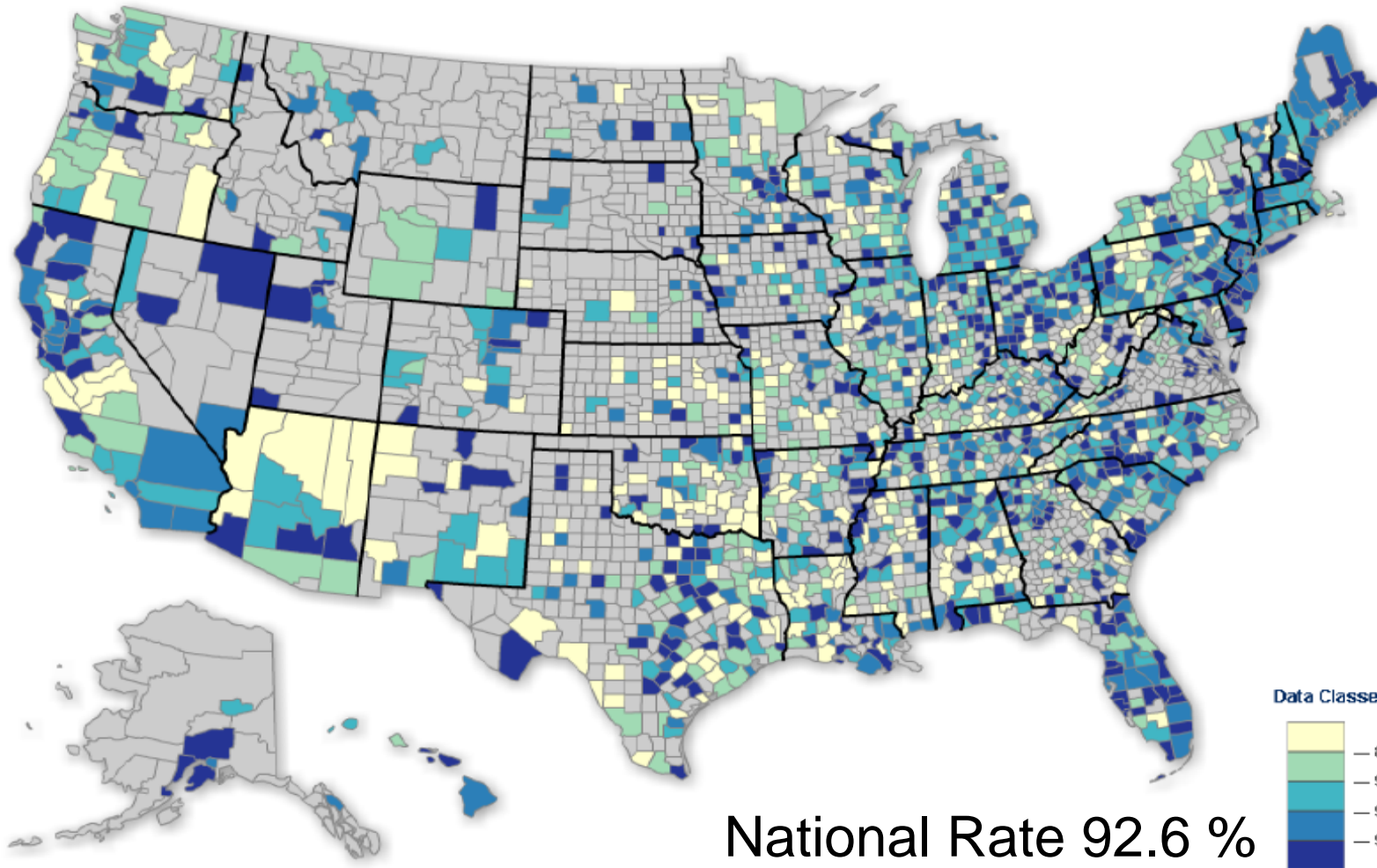
CHF Readmission Data



Readmission rate unchanged for last 5 years data

Composite CHF

Reporting Date Range: 2009-10-01 to 2010-09-30



Conclusions

- There has been very little change in many aspects of cardiac care over the last three years
- New measures reporting observed:expected ratios have been implemented
- There are trends in data, however, none are statistically different
- There is always room for improvement
 - Reduce readmissions major focus