Developing Recommendations: Risk Adjustment & Socioeconomic Status In-Person Meeting

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NATIONAL QUALITY FORUM

Whether to adjust outcome performance measures for sociodemographic factors

It depends . . .

Options

1. Maintain status quo
2. Optional – up to developer
3. Must be considered
   - Doesn't mean will always result in adjustment
   - Approach must be justified

- Option 3 consistent with current requirements regarding risk adjustment in general – could present rationale, evidence, analysis, justifying no risk adjustment even for outcomes

Strawman Recommendation

- Sociodemographic factors should be considered
- Analysis, evidence, rationale should justify adjusting or not

Query: At some point either upfront or back end we will need to define these factors. My sense is that the group is leaning towards a stronger should for SES than race..

Key Themes - Competing Concerns

- Payment – critically important that payment matches the need of the population served in order to “level the playing the field” and not worsen healthcare disparities.
- Disparities
  - Adjusting for sociodemographic factors could mask disparities, potentially entrenching disparities
  - Not adjusting for sociodemographic factors could lead to invalid inferences and reputational harm to those serving socially disadvantaged patient (including those with low SES).
  - This could affect patient, provider, and contractor choices.
- Much concern about implementation for rewards/penalties – is that an issue with the measure or the implementation?
  - Do not penalize providers when payment/resources do not meet needs of certain populations
  - Do not protect “bad apples”
  - NQF role in implementation guidance?

Key Themes – What Factors

- Variety of potential sociodemographic factors – income, English language proficiency, homelessness
- Complex pathways, not well understood; may be indicative of even more difficult to measure factors (e.g., cumulative effect of unmet needs)
- Sociodemographic factors may not influence all outcomes
- Race does not typically represent biologic difference (not necessarily genetic) but in some circumstances must be representing something that is unmeasured (e.g., low birth weight infant)
- Community – housing vacancy, tax support of safety net
- Provider characteristic - % of low income patients

Key Themes – Current Existing Data

- Need to weigh potential benefit against data collection burden
  - Difficult to collect in routine care
- Medicaid status currently problematic because of state variation on eligibility and payment for services
- Census tract data is reliable and well studied
  - Requires geocoding of patient address (HIPPA issue?)
  - Some census tracts also have substantial SES variability
- Uncertain whether comparisons based on geocoded data should be based on state or national reference.

Key Themes – Future Data

- SES may serve as a proxy for unmeasured disease severity and/or factors that impair access and adherence.
- Consideration might given to use of direct measures of these factors.
- Potential examples include self reported health status, homelessness, low health literacy.

Key Themes - Methods

- Considerations for selecting clinical risk factors apply to sociodemographic factors
  - What would be a reason for not to view them the same?
- Allow data and empirical analysis to drive decisions
- Some analyses indicate marginal benefit over clinical factors so no need to include and require extra data
- Even if no empirical advantage for adjusting, may be important for acceptance (face validity)
- Measure developers need clear expectations and committees clear guidance on how to evaluate

Need More Discussion

- Other settings
- Other outcomes – cost, experience with care, clinical (e.g., BP control)
- Other perspectives – patients/consumers, purchasers

Key Themes – Differences by Outcome, Use

- Differ by outcome
- Could be relevant for some process measures
- Do not include in statistical model if purpose is to identify disparities and work on improvement
- Adjust for sociodemographic factors for accountability uses
  - What would be the reason to consider differences by type of accountability – public reporting, P4P, other?

Core Principles
as discussed on call 12/09/13

1. Outcomes may be influenced by patient health status/clinical and sociodemographic factors (patient and community) in addition to healthcare services, treatments and interventions.
2. Outcome performance measures used in accountability applications need to be adjusted for differences in case mix to avoid incorrect inferences about performance. (Note that this principle does not identify which risk factors are appropriate and a how model is applied.)
3. Disparities in health and healthcare should be identified and reduced.
4. Performance measurement should not increase disparities in health and healthcare.
5. Risk adjustment is constrained by data limitations and data collection burden.

Core Principles - Additions

- Payment should match need

Usual Considerations for Selecting Risk Factors

- Clinical/conceptual relationship with the outcome of interest
- Empirical association with the outcome of interest
- Contribution of unique variation (i.e., not redundant or highly correlated with another risk factor)
- Not related to the quality of care (e.g., treatments, expertise of staff)
  - Present at the start of care
- Accurate data that can be reliably captured
- Improvement in risk model metrics (e.g., discrimination, calibration) and sustained with cross-validation

How – what approach?

- What are the pros and cons of various methods (e.g., stratification within providers, statistical risk model, stratification for peer groups)
- When should various methods be employed?
- Are there differences based on type of outcome or use of the performance measure? If so, rationale.

PROs/CONs of Approaches for Including Sociodemographic Factors

	PROs	CONs
Statistical	Consistent w/handling of clinical factors More complete patient mix adjustment Contrast with unadj model	Mask disparities
Stratification within organ.	Disparities visible Data for QI	Sample sizes, reliability
Organizational stratification	Disparities visible Comparison group with like patients	Challenge in defining groups

How

- Are there any things that should not be done?

Breakout – Sociodemographic Factors Specific Recommendations

- Definition
- What sociodemographic factors?
  - Always the same ones?
- Existing data
- Future data

Breakout – Approaches to How Specific Recommendations

- Statistical
- Stratification – within provider, organizational
- Other
- What will be expected of developers, how to evaluate

Breakout – Context Specific Recommendations

- Differences by type of outcome, setting, use
- If so, what is rationale?
- What about process measures?
- Guidance for implementation/use

Breakout – Context Specific Recommendations

- Individual measures (process **and** outcome) submitted to NQF must include analysis of the data to demonstrate relevance/ impact of sociodemographic variables on the risk adjustment model/performance measure score
  - Analysis provided in the measure submission must show why adjustment is not relevant, if that is the case
  - Where relevant, developer submits recommendations specific to the measure as to what sociodemographic variables should be included in the measure specifications
  - Developer should also include guidance on reporting of the measure based on the intended use of the measure

Breakout – Context
Specific Recommendations (continued)

The List – Suggested Factors

TOP TIER	2nd tier
depends on data availability and the outcome being measured	
Income **Education** **Homelessness** **English proficiency** **Insurance status** **Neighborhood** **Race*** **Ethnicity*** **(*shouldn't be used for SES proxy)**	**Social support** **Occupation** **Employment status** **Literacy** **Health literacy** **Local/state funding availability (tax base)** **Health status(?)**

Recommendations – Approaches

Developer should present:

- Conceptual description - causal pathway,
  - Informed by review of literature, content experts
- Variables considered
  - Must consider patient, provider, community variables
- Effect at performance score (with and without)

Same considerations for selecting clinical factors, except:

- Clinical variables first – sociodemgraphic variables in addition to
- If seeing differences – mediated by quality differences may not wish to include

Recommendations – Approaches continued

- NQF should identify context of endorsement – indications for use – data source, setting, patient population, level of analysis
- Need to separate purpose of identifying disparities from performance measurement for accountability
- Intent is not to make everyone get an "A" – need to use both
  - Clinical adjustment only for public reporting
  - Account for sociodemographic factors in P4P

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