Structured Implicit Review for Physician Implicit Measurement of Quality of Care: Development of the Form and Guidelines for Its Use

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PREFACE

In an effort to contain the spiraling costs of health care in the United States, a prospective payment system (PPS) based on diagnosis related groups (DRGs) was implemented in the United States in 1983. This changed the system of Medicare hospital reimbursement from a fee-for-service system where the fund paid for the services provided to patients to a prospective payment system in which hospitals were reimbursed a fixed amount for each patient according to the DRG to which the patient was assigned. The fixed payment per case provides incentives for hospitals to reduce length of stay and to reduce the delivery of expensive services delivered to each patient.

In October 1985, The RAND Corporation began an evaluation of the effect of DRG-based prospective payment on the quality of care given to hospitalized Medicare patients. The project, funded by the Health Care Financing Administration (HCFA), was undertaken in collaboration with five Professional Review Organizations (PROs). The major research questions are whether, after adjustment for case mix, the prospective payment system has changed the quality of care delivered to hospitalized Medicare patients. Are patients being admitted to hospitals sicker? Are patients being discharged from hospitals sicker? If a change in quality of care exists, which patients are most affected -- the sickest, the poorest, those in rural or urban areas, those with certain diseases?

Six diseases were selected for this study: congestive heart failure, acute myocardial infarction, hip fracture, pneumonia, cerebrovascular accident, and depression. These diseases have been reasonably stable diagnostically and therapeutically from 1981 to 1986. They have well-defined diagnostic criteria that are available by review of the medical record. In addition, information necessary to assess patient sickness at admission and to assess quality of care for these diseases is likely to be recorded in the medical record.
Five states were selected for study, each from a different geographic region of the nation: California, Florida, Indiana, Pennsylvania, and Texas. Each state was divided into four or five study areas. This permitted the study of 22 areas throughout the regions of the United States. The study sample included 16,758 medical records of Medicare patients hospitalized with one of these six study diseases from 1981 through 1986. Half of the sample was from the period before the DRG-based prospective payment system was implemented (1981-1982) and half was from the period after its implementation (1985-1986).

To assess quality of care both explicit and implicit measures were used. With explicit measurement each patient's care was compared with predetermined standards about how care should be provided. Data collectors abstracted particular items from the patient's medical record about sickness at admission, processes of care, status at discharge, and inpatient outcomes. These items formed the basis for scales that measured quality. For background on the instruments for explicitly measuring quality of care, see:

Kahn, Katherine L., Mark R. Chassin, Lisa V. Rubenstein, et al., Medical Record Abstraction Form and Guidelines for Assessing Quality of Care for Hospitalized Patients with Congestive Heart Failure, The RAND Corporation, N-2798-HCFA, December 1988.


Roth, Carol P., Katherine L. Kahn, Marjorie J. Sherwood, et al., Medical Record Abstraction Form and Guidelines for Assessing Quality of Care for Hospitalized Patients with Pneumonia, The RAND Corporation, N-2801-HCFA, December 1988.


With the implicit review measures, physicians used their judgment to assess sickness at admission, processes of care, status at discharge, and inhospital outcomes after reviewing the entire medical record. To guide the development of the instruments for measuring implicit review, the research team reviewed the literature regarding quality of care for patients hospitalized with each disease and the literature regarding implicit review. Then, PRO-selected physicians from the five participating states were invited to participate in a disease-specific panel meeting to discuss and test implicit measures of quality of care. Physicians were asked to discuss the problems they had previously experienced in implicitly reviewing records for purposes of inhospital (e.g., morbidity and mortality conferences) or PRO review. In addition, advice was sought about the way medical records might differ by type of hospital or geographic area so that the implicit review form for measuring quality of care could be developed for use in all kinds of acute care general hospitals in the United States.

This system was used for implicit review to study patients with five of the six study diseases; depression records were evaluated with another method not reviewed in this publication. Panel meetings were disease-specific, and RAND clinician researchers and one physician from each of the five participating states attended each meeting. General internists attended the panel meeting for congestive heart failure, cardiologists attended the panel meeting for acute myocardial infarction, pulmonologists attended the panel meeting for pneumonia, neurologists attended the panel meeting for cerebrovascular accident, and orthopedists attended the panel meeting for hip fracture.

During the implicit review panel meeting, physicians read medical records and used a disease-specific draft version of the implicit review form to assess quality of care. Medical records were sanitized, that is
information regarding state, city or town, hospital, physician, and nurse was removed. Each physician rated the same practice medical records individually but then shared aloud with the other physician panelists his/her responses to implicit review items. This allowed each panelist to recognize the degree of agreement or disagreement in the ratings. When disagreement occurred, the research team members and the physician panelists attempted to distinguish disagreement about quality of care from misunderstanding about the meaning of the implicit review form item. In the latter instance, the item was rewritten to reduce misunderstandings in interpretation.

After the panel meetings, the research team rewrote the implicit review form. This revised form was then used by the physician raters on a different group of medical records. Each physician rater discussed the implicit ratings of two records with one of the clinician researchers in a 30-minute phone call and again discrepancies between reviewers' interpretation of items were noted. If items remained a problem they were revised again. The form for each disease was tested again by all of the physician reviewers for that disease; then researchers and raters discussed implicit quality of care ratings for two additional medical records during a two-hour conference call. Finally, areas of agreement and disagreement between physician raters were discussed and the form was revised using input from the physician raters.

The final disease-specific structured implicit review form as discussed in this Note is the result of the steps taken above. The form has been used by the physician raters to implicitly rate quality of care for 1,366 different medical records.

Physician reviewers had access to a RAND research physician's telephone hotline to discuss any issues of ambiguity about how to use the form in the field. However, research physicians did not offer advice about how to actually assign a rating.

Each completed implicit review form was reviewed by a clinician researcher for internal consistency of results and for skip patterns. Forms identified as having problems were discussed with the physician
reviewer by phone and at times were returned to the reviewer for repeat review. These problems occurred with fewer than 0.5 percent of the cases reviewed. A percentage of records was reviewed by more than one reviewer allowing studies of interrater reliability. In addition, the results of the implicit review ratings were compared with explicit review ratings of quality of care. These analyses are discussed in:

SUMMARY

The purpose of this Note is to document the structured implicit review form used for the implicit measurement of quality of care for Medicare patients hospitalized with congestive heart failure, acute myocardial infarction, pneumonia, cerebrovascular accident, and hip fracture. Although we intended to develop disease-specific forms, we found, after our pilot testing, that the items developed to measure quality of care for congestive heart failure, acute myocardial infarction, and pneumonia were identical. Thus, for these three diseases, the forms are identical; the forms for cerebrovascular accident and hip fracture have some items that differ because of the way medical records are written for these diseases and because of the technologies used for these diseases.

THE STRUCTURED IMPLICIT REVIEW FORM

The purpose of the structured implicit review form is to guide physicians in their review of the medical record for purposes of implicitly assessing quality of care. The form does not tell physicians how to rate quality of care. Rather, it is designed to guide the physician reviewer to consider certain topics. The forms contain 28 items for congestive heart failure, acute myocardial infarction, and pneumonia; 31 items for cerebrovascular accident; and 30 items for hip fracture. Forms were designed so that, on average, a medical record could be reviewed and a form completed within 30 minutes. A copy of each form is included in this Note.

The items noted above are grouped together on the form into 10 questions for congestive heart failure, acute myocardial infarction, and pneumonia. The cerebrovascular accident form has 11 questions and the hip fracture form has nine. The sequence of questions described below is followed exactly in the forms for the first three diseases. There are slight variations in the forms for the other two diseases.
The first question focuses the physician reviewer on the quality of documentation in the medical record with respect to the patient's prior and chronic disease, functional status, habits, and psychosocial status before the acute illness that precipitated the admission. This item provides the analysis team with a measure of how much information was in the record and the completeness of the data that the physician reviewer used to make a decision about the quality of care delivered. In addition, this item permits assessment of how well the physician gathered and reported data about prior illness.

The second question asks about the quality of the physician's initial assessment based on the patient's acute medical problems present at admission. This question isolates three important concepts in quality: the completeness of the initial data gathering, the physician's integration of admission information and recognition of the most likely diagnostic probabilities, and the physician's development of an appropriate treatment plan with appropriate orders. The physician rater is asked to assign ratings for each of these three components of care given the patient's needs as noted during review of the medical record.

The third question asks the physician rater to prognosticate about the patient's life expectancy given the patient's disease burden at admission.

The fourth question asks the physician rater to evaluate the effectiveness of medical science in treating the patient's acute illness and in preventing worsening of the illness.

The fifth question moves the physician rater away from the status of the patient at admission and asks the rater to consider the appropriateness of use of services, on average, during the hospital stay. Raters were asked to assign specific ratings of appropriateness with respect to the patient's needs. If the physician rater identified inappropriate use of services, the rater was asked whether the problem was a case of underuse.
The sixth question asked about the appropriateness of length of stay given the patient's status at discharge and disposition plans as noted in the medical record. This question was answered only for patients discharged alive. If the length of stay was considered inappropriate, further judgment was sought from the physician rater about whether the length of stay was too long or too short and about the apparent reasons for the inappropriate length of stay.

The seventh question asked whether the physician reviewer believed a patient's inpatient death was preventable.

The eighth question asked the physician rater to characterize the patient's outcome at discharge as better or worse than expected given the patient's condition and the treatability of the patient's illnesses.

The ninth question asks the physician to consider all he/she could learn about the care delivered to the patient by reading the medical record and to rate the overall quality of care for the hospital stay.

The final question emphasizes an emotional rather than a thoughtful response from the physician rater. This asks whether the physician rater would send his or her mother to the physicians and hospital in the record just reviewed.

GUIDELINES

For each disease and for each item we developed guidelines to encourage consistency in the way the items were interpreted. This Note presents a copy of the guidelines for each disease. Principles for using the form are outlined in the guidelines. The principles are the same across all forms and diseases.
ACKNOWLEDGMENTS

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INTRODUCTION

The structured implicit review form and guidelines provide a framework for physician assessment of quality of care. Our hope is to increase the accuracy of implicit physician quality of care review. We want to preserve the subtlety of physician judgment in case-by-case reviews while increasing standardization across cases. We hope to accomplish this by specifying each part of hospital care to be judged (e.g., initial data gathering, technology use, or medication use). We also provide a yardstick for measuring care in each area.

The basic principle underlying our yardstick is that adequate care in the United States is care that minimizes the risk of complications, maximizes the likelihood of a good outcome, and maximizes humane care of the patient -- but at a level achievable by motivated practitioners under average conditions at any average U.S. hospital.

In specifying ratings, physician reviewers were asked to consider average conditions at average U.S. hospitals. In addition, they were asked to avoid adjusting ratings according to guesses about the size or type of hospital in which the patient is treated. During analysis, the research team will incorporate hospital-specific data to adjust for each hospital's characteristics.

USING THE FORM

This Note provides copies of each disease-specific structured implicit review form and guidelines for each of the form's questions. Before the form is used for implicit review, users should be trained in how to use it. The guidelines provide specific question-level information. However, training in how to use the form should involve interactive sessions between individuals who know how to use it and the physician learning to use it. The goal of the training is to encourage physicians using the form to agree about the meaning and interpretation of each question. This will maximize the probability that differences
in physicians' ratings about quality of care will, in fact, reflect differences in their belief about how care was delivered for a patient, rather than differences in how they interpret the form's questions about assessing quality.

We used two or three physician leaders (instructors) to train physician reviewers in groups of 10 or fewer. The goal of the training was to help physician reviewers become confident with this method of implicit review and to help them develop confidence that they were using the method the same as their colleagues. During the training sessions we did not tell physician reviewers what constitutes good quality of care. Instead, we helped them clarify their own concepts of good quality. During training our main goal was to teach the physician reviewers to use the structured implicit review system as a measurement tool that will reflect their views about quality case by case.

Reviewers were taught during training to anchor their ratings to an already established concept of poor or good care. For most items, reviewers were asked to use the lowest response category when the care given would have been highly likely to contribute to a bad outcome, whether or not a bad outcome actually occurred in that case. To rate the quality of a physician's history or clinical assessment, raters were instructed to use the lowest response category ("very poor") if the rater, when asked to see the patient at midnight, had to start from scratch in his or her evaluation. A judgment of "adequate" meant that most essential historical and assessment observations were included, but additional data might be required for optimal diagnosis and treatment. "Excellent" meant that all necessary data were present. "Good" was somewhat better than adequate, and "poor" somewhat worse.

Reviewers were asked to judge urban, rural teaching, and nonteaching hospitals according to the same standard. They were asked not to adjust their ratings according to their guesses about the type of hospital from which a record came. Reviewers were asked to rate care as inadequate (i.e., as "poor" or "very poor") when that care did not meet a level achievable by most hospitals, and not to judge care as inadequate solely for failure to perform extraordinary or controversial procedures.
Reviewers were asked to take account of "Do Not Resuscitate" (DNR) orders. They were asked to judge care for these patients according to their own implicit standards for the care of "DNR" patients. Reviewers were asked not to second-guess the medical records, in terms of the level of aggressiveness of treatment aspired to by the physicians caring for the patient, when no explicit statement about low aggressiveness of care was present in the record.

Below is a list of principles essential to the optimal use of the structured implicit review form. These principles should be reviewed with potential users of the method before using the method for actual quality of care evaluations. Twenty-one principles are listed below. Each of these is elaborated on in greater detail in the form's guidelines.

1. Each case must be assessed individually with particular attention to quality of care for that patient given their degree of sickness at the time of admission to the hospital. When considering the patient's sickness at admission, attention must be paid to both their burden of chronic disease and to their acute disease. In each case both morbid and comorbid conditions should be considered.

2. For each patient, physician raters should use data about the patient's acute and chronic morbid and comorbid diseases at admission to estimate the patient's life expectancy. In developing this estimate, physician raters should avoid considering the patient's inhospital outcome. The latter could result from either the patient's sickness at admission or from inhospital care. It is useful for the physician to predict outcome (i.e., life expectancy) based on sickness at admission without confounding by the patient's actual outcome.
3. It is also useful for physician raters to evaluate how effective medical therapy is for this patient's problem in the average U.S. hospital. This assessment should be made without regard for how the patient was treated or the patient's actual outcome.

4. It is useful to distinguish the acute hospital stay into an initial component addressing diagnostic and management decisions and plans directly related to patient status at admission and a latter component addressing later phases of the hospitalization.

5. To assure consistency among reviewers, guidelines should be followed about which section of the medical record to review for which question about quality of care. In some instances (e.g., evaluation of the initial component of the hospitalization), only a specific component (e.g., the first two hospital days) should be reviewed.

6. This system of structured implicit review attempts to rate quality of care delivered to the patients during the hospital stay. The goal is not to rate a particular physician as excellent or poor. Thus, when assessing hospitalizations involving care of the patient by more than one physician, the quality of care assessment should integrate care delivered by all providers to the patient. The physician reviewer is asked to implicitly weight the contributions of the various physicians caring for a patient. Thus, if it appears that the emergency room physician and the attending physician performed with excellence but the consultant performed less than optimally, the physician rater would consider each of these three performances and their relative importance to the patient's care and outcome when assigning the quality of care assessment.
7. An important component of quality of care that can and should be assessed from the medical record is the quality of the documentation in the medical record. For each patient, the pertinent positive and negative patient findings that should be documented differ. Assessment of the quality of documentation should depend upon the patient's burden of acute and chronic disease.

8. In some instances the patient is extremely well known to the admitting physician as a result of either a longstanding outpatient doctor-patient relationship or recurrent hospitalizations. In both instances already existing written information may document much of the patient's history. When the record provides evidence that this is the case, the expectations for the adequacy of documentation may be different than if the patient is not well known to the physician. Even if the patient is well known to the admitting physician, certain (to be determined case by case) critical items should be documented again in the medical record.

9. In instances where the patient is too sick to provide critical information about his or her pertinent history, attempts (or lack of such attempts) to ascertain critical data can be integrated into ratings about the quality of data gathering for the patient.

10. Evaluation of the patient's quality of care is made easier if the quality of data gathering about chronic and prior conditions is separated from the quality of data gathering about the event that precipitated the patient's acute admission.
11. Evaluation of the physician's initial approach to the patient's acute problem (that which precipitated the admission) can be separated into three distinct components: the quality of initial data gathering; the quality of the integration of available data into an appropriate list of diagnoses; and the quality of initial therapeutic plans. Consideration of these three components separately will ease the physician reviewers' task of assigning an overall quality rating, since in many cases quality excels for one component but is inadequate for another. If physician raters do not keep these components separate and the care is discrepant across them, the quality ratings are likely to disagree across physician raters.

12. Physicians are asked to assess the appropriateness of use of services during the hospital stay. When assigning appropriateness ratings the physician rater should consider three concepts: How useful are services such as the ones given to the patient under study in improving outcome for most patients such as the one under study; were the services used with optimal frequency; and was the timing of the services too early or too late throughout the hospital stay?

To assure that physician reviewers evaluate the same aspects of each case, reviewers are asked to average the appropriateness of use of services across the hospital stay. If the use of a service is optimal during one period of the hospital stay but inadequate during another period, the physician reviewer is asked to implicitly weight the importance of the different periods of use during the hospital stay and to integrate the ratings from each of these periods into a single rating of appropriateness for each service.
13. When use of a service is considered inappropriate, then the physician rater is encouraged to consider whether the service was used inappropriately because of improper use (e.g., wrong antibiotic), overuse, or underuse of the service. Consideration of all three of these definitions of inappropriate use by all physician reviewers will preclude their disagreeing about appropriateness ratings because one rater focused on overuse while another focused on underuse.

14. When evaluating the appropriateness of use of services, the physician reviewer needs guidance about whether to evaluate the appropriateness of an order (or lack of an order) for a service (e.g., respiratory therapy to deliver intermittent positive pressure breathing treatment every four hours) or whether to evaluate how well an order was implemented (e.g., was the treatment delivered on schedule?).

15. Physicians are asked to assess whether a patient's in-hospital death was preventable after consideration of the patient's sickness at admission, the treatability of the patient's condition by medical science, and the actual processes of care delivered to the patient during the hospitalization. Emphasis is placed on physician raters evaluating the preventability of death only after careful consideration of each of these items.

16. When considering the preventability of a patient's in-hospital death, physicians were asked to consider both egregious errors made during the hospitalization and any smaller errors of omission or commission that produced poor care.

17. When quality of care for patients with surgical conditions is being evaluated, physician raters are encouraged to consider the quality of the medical care separately from the quality of the surgical care.
18. When evaluating the appropriateness and adequacy of interventions for patients with surgical problems, it is useful for physician raters to consider at least four different components of the patient's care: appropriateness of the choice of surgical versus nonsurgical treatment; appropriateness of the type of operation; adequacy of the patient's stabilization before surgery; and adequacy of the technical component of the operation.

19. If the patient is treated with more than one surgical intervention, the physician rater is encouraged to assign one rating to evaluate the appropriateness and adequacy of all of the surgical interventions combined. The physician rater may implicitly weight the contributions of each of these surgeries to reflect the total number and type of surgical interventions.

20. Physician raters are trained to evaluate whether the patient's outcome at hospital discharge is better or worse than expected given the patient's level of sickness at admission and the treatability of the patient's condition. In assigning this rating physicians are asked to ignore processes of care that were delivered and to study the actual outcome in relation to what was expected for the patient.

21. Finally, after considering the quality of a number of components of the hospital stay, physician raters are asked to provide global ratings of the quality of the entire hospitalization. Physicians are asked to provide a thoughtful response and are then asked to provide a response that will incorporate their emotional response to the care provided to the patient.
We have now trained more than 60 physicians using these basic principles for structured implicit review. We believe that the system can meaningfully contribute to the measurement of quality of care when these training principles are used in conjunction with the form and the guidelines. In our experience, using physician group leaders to train the physicians is quite important in helping the physician reviewers to understand and incorporate these principles. When the physicians discuss the principles with colleagues, test the use of the principles on actual medical records, and interactively work with physicians to see how to use the principles effectively, the structured implicit review system is used most effectively.
1) Please rate the quality of physician and nurse documentation of each of the following: patient's prior and chronic disease, functional status, habits, and psychosocial status prior to the current acute illness.

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<tr>
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<td>b) physician documentation of functional status (e.g., ambulation)</td>
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<tr>
<td>c) physician documentation of habits (e.g., alcohol, smoking, diet)</td>
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<tr>
<td>d) physician documentation of psychosocial status (e.g., dementia, depression, nursing home residence)</td>
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<tr>
<td>e) nurse documentation of prior and chronic disease, functional status, habits, and psychosocial status</td>
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<tr>
<td>f) Check here if the record demonstrates evidence that the physician has ready access to additional records that supplement the current data regarding the patient's prior condition.</td>
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2) Please rate the physician initial assessment of acute medical problems present at admission. Base your answer on the history, physical, and labs.

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<td>a) completeness of initial data gathering</td>
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<tr>
<td>b) integration of admission information and development of appropriate diagnoses</td>
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<td></td>
<td>22</td>
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<tr>
<td>c) initial treatment plan and initial orders</td>
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<td>23</td>
</tr>
</tbody>
</table>
3) Assume adequate to optimal care and assume the patient recovers from this episode of congestive heart failure. What do you believe is this patient's life expectancy?

< 1 month ______ (1) 24/
1-6 months ______ (2) 25/
> 6 months-1 year ______ (3) 26/
> 1 year ______ (4) 27/

4) Assume adequate to optimal care by the physician and hospital. How effective is medical science in treating this patient's acute illness or in preventing worsened health status due to the illness? Consider the severity of the patient's acute illness and the patient's chronic reserve.

very effective ______ (1) 28/
effective ______ (2) 29/
not so effective ______ (3) 30/
very ineffective ______ (4) 31/

5) Considering the entire hospitalization, on average, was use of these services appropriate with respect to the patient's needs? If not appropriate, was it because of underuse?

<table>
<thead>
<tr>
<th>Definitely yes</th>
<th>Probably yes</th>
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<tr>
<td>ai) Intensive care</td>
<td></td>
<td></td>
<td></td>
<td>ai) 27/</td>
</tr>
<tr>
<td>aii) Telemetry without intensive care</td>
<td></td>
<td></td>
<td></td>
<td>aii) 28/</td>
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<tr>
<td>b) Respiratory therapy delivered</td>
<td></td>
<td></td>
<td></td>
<td>b) 29-30/</td>
</tr>
<tr>
<td>c) O₂ and ventilation</td>
<td></td>
<td></td>
<td></td>
<td>c) 31-32/</td>
</tr>
<tr>
<td>d) Arterial blood gases</td>
<td></td>
<td></td>
<td></td>
<td>d) 33-34/</td>
</tr>
<tr>
<td>e) Physical therapy delivered</td>
<td></td>
<td></td>
<td></td>
<td>e) 35-36/</td>
</tr>
<tr>
<td>f) EKGs</td>
<td></td>
<td></td>
<td></td>
<td>f) 37-38/</td>
</tr>
<tr>
<td>g) Chest x-rays</td>
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<td>g) 39-40/</td>
</tr>
<tr>
<td>h) Venous blood tests, urinalyses, sputum analyses</td>
<td></td>
<td></td>
<td></td>
<td>h) 41-42/</td>
</tr>
<tr>
<td>i) Consultations</td>
<td></td>
<td></td>
<td></td>
<td>i) 43-44/</td>
</tr>
<tr>
<td>j) Medications (type and route)</td>
<td></td>
<td></td>
<td></td>
<td>j) 45-46/</td>
</tr>
</tbody>
</table>
ANSWER QUESTION 6 ONLY IF THE PATIENT WAS DISCHARGED ALIVE

6) Was length of stay appropriate given the patient's status at discharge and disposition plans?
   definitely yes ___ (1)  47/
   probably yes ___ (2)
   probably no ___ (3)
   definitely no ___ (4)

6a) If probably or definitely not appropriate, how would you describe length of stay?
   too short ___ (1)  48/
   too long ___ (2)

6b) If length of stay was too short or too long, what were the apparent reasons? Check one or more reasons if applicable.

<table>
<thead>
<tr>
<th>Too short</th>
<th>Too long</th>
</tr>
</thead>
<tbody>
<tr>
<td>i) Patient too unstable</td>
<td>v) Waiting for nursing home or ECF bed</td>
</tr>
<tr>
<td>ii) Work-up incomplete</td>
<td>vi) Waiting for home care support service</td>
</tr>
<tr>
<td>iii) Rehabilitation incomplete</td>
<td>vii) Patient or family refused discharge</td>
</tr>
<tr>
<td>iv) Patient or family insisted on discharge</td>
<td>viii) Waiting for procedure</td>
</tr>
</tbody>
</table>

ANSWER QUESTION 7 ONLY IF THE PATIENT DIED DURING THE HOSPITALIZATION

7) Was the patient's death preventable?
   definitely preventable ___ (1)  57/
   probably preventable ___ (2)
   probably not preventable ___ (3)
   definitely not preventable ___ (4)
ANSWER THE REMAINING QUESTIONS FOR ALL PATIENTS

8) How would you characterize the patient's outcome at discharge?
   much better than expected  ____ (1)
   better than expected  ____ (2)
   as expected  ____ (3)
   worse than expected  ____ (4)
   much worse than expected  ____ (5)

9) Considering everything you know about this patient, please rate overall quality of care.
   extreme, above standard  ____ (1)
   above standard  ____ (2)
   adequate  ____ (3)
   below standard  ____ (4)
   extreme, below standard  ____ (5)

10) Would you send your mother to these physicians in this hospital?
    definitely yes  ____ (1)
    probably yes  ____ (2)
    probably no  ____ (3)
    definitely no  ____ (4)
DRG/QC STUDY
IMPLICIT REVIEW FORM
ACUTE MYOCARDIAL INFARCTION

Case ID: AMI 2
Review Date 4-8/9-14/

1) Please rate the quality of physician and nurse documentation of each of the following: patient's prior and chronic disease, functional status, habits, and psychosocial status prior to the current acute illness.

   a) physician documentation of prior and chronic disease
      | ______ | ______ | ______ | ______ | 15/
   b) physician documentation of functional status (e.g., ambulation)
      | ______ | ______ | ______ | ______ | 16/
   c) physician documentation of habits (e.g., alcohol, smoking, diet)
      | ______ | ______ | ______ | ______ | 17/
   d) physician documentation of psychosocial status (e.g., dementia, depression, nursing home residence)
      | ______ | ______ | ______ | ______ | 18/
   e) nurse documentation of prior and chronic disease, functional status, habits, and psychosocial status
      | ______ | ______ | ______ | ______ | 19/
   f) Check here if the record demonstrates evidence that the physician has ready access to additional records that supplement the current data regarding the patient's prior condition.
      [ ] 20/

2) Please rate the physician initial assessment of acute medical problems present at admission. Base your answer on the history, physical, and labs.

   a) completeness of initial data gathering
      | ______ | ______ | ______ | ______ | 21/
   b) integration of admission information and development of appropriate diagnoses
      | ______ | ______ | ______ | ______ | 22/
   c) initial treatment plan and initial orders
      | ______ | ______ | ______ | ______ | 23/
3) Assume adequate to optimal care and assume the patient recovers from this episode of acute myocardial infarction. What do you believe is this patient's life expectancy?

<table>
<thead>
<tr>
<th>Option</th>
<th>Code</th>
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<tbody>
<tr>
<td>&lt; 1 month</td>
<td>(1)</td>
</tr>
<tr>
<td>1-6 months</td>
<td>(2)</td>
</tr>
<tr>
<td>&gt; 6 months-1 year</td>
<td>(3)</td>
</tr>
<tr>
<td>&gt; 1 year</td>
<td>(4)</td>
</tr>
</tbody>
</table>

4) Assume adequate to optimal care by the physician and hospital. How effective is medical science in treating this patient's acute illness or in preventing worsened health status due to the illness? Consider the severity of the patient's acute illness and the patient's chronic reserve.

<table>
<thead>
<tr>
<th>Option</th>
<th>Code</th>
</tr>
</thead>
<tbody>
<tr>
<td>Very effective</td>
<td>(1)</td>
</tr>
<tr>
<td>Effective</td>
<td>(2)</td>
</tr>
<tr>
<td>Not so effective</td>
<td>(3)</td>
</tr>
<tr>
<td>Very ineffective</td>
<td>(4)</td>
</tr>
</tbody>
</table>

5) Considering the entire hospitalization, on average, was use of these services appropriate with respect to the patient's needs? If not appropriate, was it because of underuse?

<table>
<thead>
<tr>
<th>Service</th>
<th>Definitely Yes (1)</th>
<th>Probably Yes (2)</th>
<th>Probably No (3)</th>
<th>Definitely No (4)</th>
<th>Underuse</th>
</tr>
</thead>
<tbody>
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<td>a) Monitoring intensity</td>
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<td></td>
<td></td>
<td></td>
<td>a)</td>
</tr>
<tr>
<td>a1) Intensive care</td>
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<td>a1)</td>
</tr>
<tr>
<td>a2) Telemetry without intensive care</td>
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<td></td>
<td></td>
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<td>a2)</td>
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<tr>
<td>b) Respiratory therapy</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>b)</td>
</tr>
<tr>
<td>c) O₂ and ventilation</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>c)</td>
</tr>
<tr>
<td>d) Arterial blood gases</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>d)</td>
</tr>
<tr>
<td>e) Physical therapy</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>e)</td>
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<tr>
<td>f) EKGs</td>
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<td>f)</td>
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<tr>
<td>g) Chest x-rays</td>
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<td>g)</td>
</tr>
<tr>
<td>h) Venous blood tests, urinalyses, sputum analyses</td>
<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>i) Consultations</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>i)</td>
</tr>
<tr>
<td>j) Medications (type and route)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>j)</td>
</tr>
</tbody>
</table>
ANSWER QUESTION 6 ONLY IF THE PATIENT WAS DISCHARGED ALIVE

6) Was length of stay appropriate given the patient's status at discharge and disposition plans?

- definitely yes ___ (1)
- probably yes ___ (2)
- probably no ___ (3)
- definitely no ___ (4)

6a) If probably or definitely not appropriate, how would you describe length of stay?

- too short ___ (1)
- too long ___ (2)

6b) If length of stay was too short or too long, what were the apparent reasons? Check one or more reasons if applicable.

<table>
<thead>
<tr>
<th>Too short</th>
<th>Too long</th>
</tr>
</thead>
<tbody>
<tr>
<td>i) Patient too unstable</td>
<td>v) Waiting for nursing home or ECF bed</td>
</tr>
<tr>
<td>ii) Work-up incomplete</td>
<td>vi) Waiting for home care support service</td>
</tr>
<tr>
<td>iii) Rehabilitation incomplete</td>
<td>vii) Patient or family refused discharge</td>
</tr>
<tr>
<td>iv) Patient or family insisted on discharge</td>
<td>viii) Waiting for procedure</td>
</tr>
</tbody>
</table>

ANSWER QUESTION 7 ONLY IF THE PATIENT DIED DURING THE HOSPITALIZATION

7) Was the patient's death preventable?

- definitely preventable ___ (1)
- probably preventable ___ (2)
- probably not preventable ___ (3)
- definitely not preventable ___ (4)
ANSWER THE REMAINING QUESTIONS FOR ALL PATIENTS

8) How would you characterize the patient's outcome at discharge?

- much better than expected (1)
- better than expected (2)
- as expected (3)
- worse than expected (4)
- much worse than expected (5)

9) Considering everything you know about this patient, please rate overall quality of care.

- extreme, above standard (1)
- above standard (2)
- adequate (3)
- below standard (4)
- extreme, below standard (5)

10) Would you send your mother to these physicians in this hospital?

- definitely yes (1)
- probably yes (2)
- probably no (3)
- definitely no (4)
1) Please rate the quality of physician and nurse documentation of each of the following: patient's prior and chronic disease, functional status, habits, and psychosocial status prior to the current acute illness.

   a) physician documentation of prior and chronic disease
      | excellent | good | adequate | poor | very poor |
      |  |  |  |  | 5 |

   b) physician documentation of functional status (e.g., ambulation)
      | excellent | good | adequate | poor | very poor |
      |  |  |  |  | 6 |

   c) physician documentation of habits (e.g., alcohol, smoking, diet)
      | excellent | good | adequate | poor | very poor |
      |  |  |  |  | 7 |

   d) physician documentation of psychosocial status (e.g., dementia, depression, nursing home residence)
      | excellent | good | adequate | poor | very poor |
      |  |  |  |  | 8 |

   e) nurse documentation of prior and chronic disease, functional status, habits, and psychosocial status
      | excellent | good | adequate | poor | very poor |
      |  |  |  |  | 9 |

   f) Check here if the record demonstrates evidence that the physician has ready access to additional records that supplement the current data regarding the patient's prior condition.
      |  |

2) Please rate the physician initial assessment of acute medical problems present at admission. Base your answer on the history, physical, and labs.

   a) completeness of initial data gathering
      | excellent | good | adequate | poor | very poor |
      |  |  |  |  | 10 |

   b) integration of admission information and development of appropriate diagnoses
      | excellent | good | adequate | poor | very poor |
      |  |  |  |  | 11 |

   c) initial treatment plan and initial orders
      | excellent | good | adequate | poor | very poor |
      |  |  |  |  | 12 |
3) Assume adequate to optimal care and assume the patient recovers from this episode of pneumonia. What do you believe is this patient’s life expectancy?

< 1 month ________ (1) 24/
1-6 months ________ (2)
> 6 months-1 year _______ (3)
> 1 year ________ (4)

4) Assume adequate to optimal care by the physician and hospital. How effective is medical science in treating this patient’s acute illness or in preventing worsened health status due to the illness? Consider the severity of the patient’s acute illness and the patient’s chronic reserve.

very effective ________ (1) 25/
effective ________ (2)
not so effective ________ (3)
very ineffective ________ (4)

5) Considering the entire hospitalization, on average, was use of these services appropriate with respect to the patient’s needs? If not appropriate, was it because of underuse?

<table>
<thead>
<tr>
<th>definitely yes</th>
<th>probably yes</th>
<th>probably no</th>
<th>definitely no</th>
<th>underuse</th>
</tr>
</thead>
<tbody>
<tr>
<td>(1)</td>
<td>(2)</td>
<td>(3)</td>
<td>(4)</td>
<td></td>
</tr>
</tbody>
</table>

a) monitoring intensity ________ ________ ________ ________ a) 26/
ai) intensive care ________________ __________________________ a) 27/
aii) telemetry without intensive care ________________ __________________________ a) 28/
b) respiratory therapy delivered ________ ________ ________ ________ b) 29-30/
c) O₂ and ventilation ________ ________ ________ ________ c) 31-32/
d) arterial blood gases ________ ________ ________ ________ d) 33-34/
e) physical therapy delivered ________ ________ ________ ________ e) 35-36/
f) EKGs ________ ________ ________ ________ f) 37-38/
g) chest x-rays ________ ________ ________ ________ g) 39-40/
h) venous blood tests, urinalyses, sputum analyses ________ ________ ________ ________ h) 41-42/
i) consultations ________ ________ ________ ________ i) 43-44/
j) antibiotics (type and route) ________ ________ ________ ________ j) 45-46/
ANSWER QUESTION 6 ONLY IF THE PATIENT WAS DISCHARGED ALIVE

6) Was length of stay appropriate given the patient's status at discharge and disposition plans?

   definitely yes  ____ (1)  
   probably yes   ____ (2)   
   probably no    ____ (3)   
   definitely no  ____ (4)   

6a) If probably or definitely not appropriate, how would you describe length of stay?

   too short   ____ (1)  
   too long    ____ (2)   

6b) If length of stay was too short or too long, what were the apparent reasons? Check one or more reasons if applicable.

<table>
<thead>
<tr>
<th>Reason</th>
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<tbody>
<tr>
<td>Patient too unstable</td>
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<td>□</td>
</tr>
<tr>
<td>Work-up incomplete</td>
<td>□</td>
<td>□</td>
</tr>
<tr>
<td>Rehabilitation incomplete</td>
<td>□</td>
<td>□</td>
</tr>
<tr>
<td>Patient or family insisted on discharge</td>
<td>□</td>
<td>□</td>
</tr>
<tr>
<td>Waiting for nursing home or ECF bed</td>
<td>□</td>
<td>□</td>
</tr>
<tr>
<td>Waiting for home care support service</td>
<td>□</td>
<td>□</td>
</tr>
<tr>
<td>Patient or family refused discharge</td>
<td>□</td>
<td>□</td>
</tr>
<tr>
<td>Waiting for procedure</td>
<td>□</td>
<td>□</td>
</tr>
</tbody>
</table>

ANSWER QUESTION 7 ONLY IF THE PATIENT DIED DURING THE HOSPITALIZATION

7) Was the patient's death preventable?

   definitely preventable  ____ (1)   
   probably preventable   ____ (2)   
   probably not preventable ____ (3)  
   definitely not preventable ____ (4)
ANSWER THE REMAINING QUESTIONS FOR ALL PATIENTS

8) How would you characterize the patient's outcome at discharge?

<table>
<thead>
<tr>
<th>Characterization</th>
<th>Code</th>
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</thead>
<tbody>
<tr>
<td>much better than expected</td>
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</tr>
<tr>
<td>better than expected</td>
<td>2</td>
</tr>
<tr>
<td>as expected</td>
<td>3</td>
</tr>
<tr>
<td>worse than expected</td>
<td>4</td>
</tr>
<tr>
<td>much worse than expected</td>
<td>5</td>
</tr>
</tbody>
</table>

9) Considering everything you know about this patient, please rate overall quality of care.

<table>
<thead>
<tr>
<th>Quality Rating</th>
<th>Code</th>
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</thead>
<tbody>
<tr>
<td>extreme, above standard</td>
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<td>above standard</td>
<td>2</td>
</tr>
<tr>
<td>adequate</td>
<td>3</td>
</tr>
<tr>
<td>below standard</td>
<td>4</td>
</tr>
<tr>
<td>extreme, below standard</td>
<td>5</td>
</tr>
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</table>

10) Would you send your mother to these physicians in this hospital?

<table>
<thead>
<tr>
<th>Response</th>
<th>Code</th>
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<tbody>
<tr>
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<tr>
<td>probably yes</td>
<td>2</td>
</tr>
<tr>
<td>probably no</td>
<td>3</td>
</tr>
<tr>
<td>definitely no</td>
<td>4</td>
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</table>
STRUCTURED IMPLICIT REVIEW GUIDELINES FOR CONGESTIVE HEART FAILURE, ACUTE MYOCARDIAL INFARCTION, AND PNEUMONIA

QUESTION 1: Assessing physicians' and nurses' documentation of health status prior to the acute episode of illness.

PURPOSE

For this question, you are asked to rate how adequate the physicians' notes (Items 1a, 1b, 1c, and 1d) and the nurses' notes (Item 1e) are in allowing you to assess this patient's health status prior to the acute episode of illness. To assign this rating, assume you are asked to cover for the attending physician. Your ability to determine diagnostic and therapeutic plans for this patient depends upon your understanding of the patient's pre-hospital and acute conditions. This question asks how adequately the record provides you the information you need to know about the patient's status prior to the acute episode in order for you to adequately care for the patient.

This question tries to assess the quality of documentation of past medical history. There will not always be a clearly defined separation between past medical history and history of the acute illness. We define past medical history as including the history of the illness causing the admission (the morbid condition) up to the point at which the current acute deterioration occurred. Our definition of past medical history also includes the history of comorbid conditions.

For each disease and for each patient, the pertinent positives and pertinent negatives that you believe are important will vary according to the patient's pre-hospital and current conditions. Thus, the level of documentation necessary to assign a particular rating (e.g. excellent) should vary for each case since each patient's unique clinical picture will influence the amount and kind of documentation you believe is necessary.
DATA SOURCES

As data sources for this question use physicians' admitting history and physical, the emergency room notes, and any physician consult reports (notes) that evaluated the patient at admission.

If the patient's level of consciousness limits access to information about the patient, you may assign your rating according to the amount of documentation regarding attempts to gather the appropriate data.

If the patient has had multiple hospitalizations by the attending physician, it is acceptable to acknowledge a reference to old records. However, critical items should be restated.

Data sources for physician assessment of prior health status:

- Evaluate any data you find in the physician notes. In addition to the history and physical and emergency room notes, you may include physician progress notes, consultations and/or discharge summaries.
- When there is more than one data source, use all of the available data to assign your rating.
- If the patient was too sick to provide information, consider whether efforts to contact family, etc., were made. If the latter were unnecessary given the patient's circumstance, incorporate this into your rating.

RATING SCALE

Excellent: Assign Excellent if you, as the physician covering for this patient, believe you do not have to gather any further data about the patient's pre-hospital status in order to make adequate diagnostic and therapeutic decisions.

Good: Between Excellent and Adequate

Adequate: Assign Adequate if you, as the physician covering for this
patient, believe you must gather some additional data in order to accurately assess pre-hospital status as it pertains to your diagnostic and therapeutic decision-making about this patient.

*Poor:* Between *Adequate* and *Very Poor*

*Very Poor:* Assign *Very Poor* if you, as the physician covering for this patient, believe you would have to repeat the initial patient assessment and obtain your own medical history of pre-hospital status in order to make diagnostic and therapeutic decisions.

**SPECIFIC ITEMS**

**Item 1a: Documentation of Prior and Chronic Disease(s)**

Item 1a asks you to rate the quality of physician documentation regarding prior and chronic disease(s). Prior disease means a past history of a significant medical problem, even if it was episodic. Some examples of prior disease include prior surgery or a prior episode of respiratory failure. Chronic diseases are ongoing medical illnesses such as diabetes, hypertension, chronic obstructive pulmonary disease, or chronic lymphocytic leukemia.

The list of pertinent positive and negative findings will depend upon the patient's clinical circumstances. For example, it might be important to deny a history of tuberculosis in a pneumonia patient with cavitary lesions, but not important in a patient with an acute myocardial infarction.

**Item 1b: Documentation of Functional Status**

Item 1b asks you to rate the quality of physician documentation of functional status.

By functional status, we mean documentation of a patient's ability to carry out the usual activities of daily life, such as walking, eating, bathing, dressing, or toileting (i.e. continence). For purposes of this form, mental status and residence are not considered to be part of functional status. The latter are considered measures of psychosocial status (see below, Item 1d).
It is well known that functional status is generally poorly documented in the medical record. Judge these records, however, in comparison to what you think the records should contain to take adequate care of the patient. For example, assign an *Excellent* rating if the record has provided you all the information necessary about functional status in order to make diagnostic and therapeutic plans (including prognostication) for this patient.

**Item 1c: Documentation of Habits**

Item 1c asks you to rate the quality of physician documentation of patient habits prior to the acute episode of illness. Some examples of documentation regarding habits include a description of alcohol use, smoking, diet, exercise, employment, hobbies, exposures, and compliance.

Again, compare these records to your own standards for what records should contain in order to facilitate adequate clinical care.

**Item 1d: Documentation of Psychosocial Status**

Item 1d asks you to rate the quality of physician documentation of this patient's psychosocial status prior to the acute episode. Some examples of psychosocial status include a description of mental status (e.g., dementia), mood (e.g., depression), residence (e.g., nursing home).

**Item 1e: Nursing Documentation**

Item 1e asks you to rate the quality of nurses' documentation of all of the parameters described in 1a through 1d. In some medical records, this information is in a nursing intake survey, frequently (but not always) found at the beginning of nurses' notes. In others, this information is either part of the text of nursing notes, or not present at all.
Item 1f: Physician Access to Additional Patient Records

The last item on Question 1 asks you to indicate if you believe the physician has access to additional patient records that supplement the data in the medical record you have regarding the patient's prior condition.
QUESTION 2: Assessing the physicians' initial assessment of acute medical problems at admission.

PURPOSE

The purpose of Question 2 is to qualitatively assess the physicians' initial approach to the patient. The question is designed to distinguish three components of the physicians' approach:

(a) the physician as gatherer of initial data (Item 2a)
(b) the physicians' performance in integrating the available data into an appropriate initial diagnostic formulation (Item 2b)
(c) the development of an appropriate initial therapeutic plan (Item 2c)

You should rate each of the three components of this question separately. Thus, it is possible for you to rate one of these three items as Excellent and another item as Very Poor.

Initial assessment refers to data that were gathered "close" to the time of admission. For acutely ill patients, this period generally includes only the 24 hours after admission.

DATA SOURCES

As data sources for this question, use the physicians' history and physical, laboratory data as provided in the record from the time of admission, emergency room physician work-ups, physician consult notes if these were performed close enough to the time of admission, and physician initial orders. Depending upon the time of arrival at the hospital, the time of admission may mean the first or the first and second days of admission.

If the qualities of the physicians' initial assessments are discrepant (e.g., the emergency room physician's assessment is excellent and the attending physician's assessment is very poor), then assign your rating by integrating the assessments from the various physicians, but
weigh the physicians' assessments according to how important each was in determining care for the patient.

**RATING SCALE FOR SPECIFIC ITEMS**

**Item 2a: Completeness of Initial Data Gathering**

Item 2a asks you to rate the completeness of initial data gathering. You are asked to assess the degree to which the physician gathered the data about the patient's acute illness episode that were necessary to develop an adequate diagnostic and therapeutic plan. Do not evaluate documentation of health status prior to the acute episode of illness in Item 2a. Documentation of prior and chronic disease is evaluated in Item 1a.

Assign *Excellent* if the record documents all of the information necessary to formulate an adequate diagnostic and therapeutic plan. If you were covering for this physician, you would not need to gather any supplementary data in order to develop an adequate diagnostic and therapeutic plan.

*Good...Adequate...Poor:* Interpolate

Assign *Very Poor* if the record so poorly documents the information necessary to formulate an adequate diagnostic and therapeutic plan, that you would need to start from the beginning, at the bedside, and gather the data yourself.

**Item 2b: Integration of Information and Development of Diagnoses**

Item 2b asks you to rate the adequacy with which the available initial data about the patient were integrated to develop appropriate diagnostic likelihoods. You are asked to use your judgment, given the data available, to rate whether you believe the physician established the correct diagnosis(es) based on the patient's initial presentation. Although a physician may be commended for describing a long list of differential diagnoses, this question asks whether the physician named the correct set of diagnoses or diagnostic possibilities, given the data available at the time of admission.
Assign *Excellent* if you believe the physicians named the correct diagnosis(es) or the correct set of differential diagnoses.

*Good...Adequate...Poor*: Interpolate

Assign *Very Poor* if you believe the physicians' initial diagnostic assessment did not reflect the severity or the kind of illness with which the patient presented.

**Item 2c: Initial Treatment Plan**

Item 2c asks you to rate the adequacy of the initial treatment plan and the adequacy of the orders written to implement the treatment plan.
QUESTION 3: Assessing patient complexity at the time of hospital admission.

PURPOSE

The purpose of this question is to evaluate the patient's complexity at the time of admission by estimating the patient's life expectancy. Complexity is defined by the patient's chronic disease burden and the severity of the acute illness. Do not consider the patient's hospital course or outcome at discharge in estimating life expectancy.

To allow you to focus on the patient's degree of sickness at admission as a predictor of outcomes, rather than focusing on processes of care, we hold processes of care constant while rating this question. This means you should look only at data that apply to the patient's condition on admission, and assume the patient will receive adequate to optimal care.

DATA SOURCES

Use any information available in the medical record that will provide data about the patient's prior and chronic disease and about the patient's disease severity at admission. Use these data to estimate this patient's life expectancy while assuming the patient received adequate to optimal care.

RATING SCALE

Answer this question for patients alive and for those deceased at the time of discharge. If you assign a rating of "> 1 year life expectancy" (even to patients who died during the hospitalization), this means that, on average, you believe that the majority of patients hospitalized with the level of sickness of this patient would have survived > 1 year if they had received adequate to optimal care. The phrase "on average" is important here.
QUESTION 4: Assessing the effectiveness of medical science in treating this patient's acute illness.

PURPOSE

The purpose of this question is to estimate the effectiveness of adequate to optimal inpatient medical care in treating this patient's acute medical problems and in preventing worsening health status due to the illness. Pay particular attention to the severity of the patient's acute illness and the patient's chronic reserve.

DATA SOURCES

Use any data available in the medical record that provide information about the severity of the patient's acute illness and the patient's chronic reserve. Use your own judgment about the effectiveness of medical science for this patient's condition.

RATING SCALE

*Very Effective:* Very Effective means that you believe that more than 90% of patients hospitalized with the disease burden of this patient, who were also treated with adequate to optimal care, would be discharged alive and with the expectation that the patient's post hospital status would be about the same as it was prior to admission.

*Effective:* Effective means that 50-90% of patients with the disease burden of this patient would be discharged alive and with a health status similar to that prior to admission.

*Not So Effective:* Not So Effective means that most patients with the disease burden of this patient would be discharged alive but with a worsened health status than that prior to admission.
Very Ineffective: Very Ineffective means that most patients with the disease burden of this patient would be likely to die despite adequate to optimal care.
QUESTION 5: Assessing the appropriateness of the use of services.

PURPOSE

The purpose of this question is to assess the appropriateness of the use of each of the specified services. To assign your rating, consider the utility, intensity, and timing of the services, overall, throughout the hospital stay.

DATA SOURCES

Use any relevant physician, nursing, or ancillary service notes. In addition, use relevant graphics; flow sheets; and laboratory, pathology, EKG, and X-ray reports.

RATING SCALE

Definitely Yes: Definitely Yes means the use (or lack of use) of the service matched your ideal of how this service should have been used for the maximal benefit of the patient.

Probably Yes: Probably Yes means the use (or lack of use) of the service approximated but did not match your ideal of how this service should have been used for the maximal benefit of the patient.

Probably No: Probably No means the use (or lack of use) of the service fell short of your ideal of how this service should have been used.

Definitely No: Definitely No means the use (or lack of use) of the service was likely to have resulted in harm to the patient.

Underuse: Underuse means that the patient might have had an improved health status with more extensive use of the service.
Examples

1) If you believe a service should have been utilized and was utilized, then assign a rating of Definitely or Probably Yes.
2) If you believe a service should have been utilized, but the service was not utilized, then assign a rating of Probably or Definitely No. Then complete column (v) and indicate that the problem was Underuse.

SPECIFIC ITEMS

Intensive care and telemetry without intensive care: If you believe the patient should have been placed in intensive care and the patient was only placed in an intermediate care unit with telemetry, then both intensive care and telemetry without intensive care were inappropriately used for this patient and you should assign a rating of Probably or Definitely No to both. Then complete column (v) and indicate that the problem with intensive care was Underuse. Leave column (v) unchecked for telemetry without intensive care because this service was not underused.

Respiratory therapy delivered: Respiratory therapy delivered refers to the therapy received by the patient and is based on physicians' orders and the delivery of therapy by the respiratory therapist or nurse. For respiratory therapy, include the use of intermittent positive pressure breathing (IPPB); hand-held nebulizer (HHN); ultrasonic or aerosol therapy; incentive spirometer (IS); or postural drainage and percussion (PD&P).

O₂ and Ventilation: Ventilation refers to intubation with mechanical ventilation. O₂ refers to oxygen therapy by mask, nasal cannula, or prongs.
Physical therapy delivered: Base your assessment on both the physicians' orders and the delivery of therapy by the physical therapist or nurse.
QUESTION 6: Assessing the Adequacy of the Length of the Hospital Stay.

PURPOSE

The purpose of this question is to assess the adequacy of the length of the hospital stay.

DATA SOURCES

Use all relevant information in the medical record to address this question.

RATING SCALE

*Definitely Yes:* A rating of Definitely Yes means that the patient was discharged at the right time considering the benefits and risks of hospitalization. The patient did not stay in the hospital too long given his/her status in the days prior to discharge and the disposition plans for the patient. In addition, the patient was not discharged too soon. This rating means that the patient definitely benefited more than suffered as a result of the length of stay.

*Probably Yes:* A rating of Probably Yes means that the patient probably benefited more than suffered as a result of the length of stay.

*Probably No:* A rating of Probably No means that the patient probably suffered more than benefited as a result of the length of stay.

*Definitely No:* A rating of Definitely No means that the patient definitely suffered more than benefited as a result of the length of stay.
Too Short: A rating of Too Short means that the patient had a significant chance of adverse health consequences that might have been avoided had the patient remained in the hospital longer.

Too Long: A rating of Too Long means that the patient remained in the hospital beyond the point of maximal benefit.

Note
If the patient was transferred to another acute care hospital for further care, assign a rating of Probably Yes.

SPECIFIC ITEMS
Item 6b

Apparent reasons for too short length of stay

- Patient too unstable for level of care to which he/she is being discharged
- Work-up incomplete and unlikely to be completed after discharge
- Rehabilitation incomplete and unlikely to be completed after discharge
- Patient or family insisted on discharge

Apparent reasons for too long length of stay

- Waiting bed at nursing home or extended care facility
- Waiting preparation of home care support services
- Patient or family refused discharge
- Waiting specific diagnostic or therapeutic procedure

If none of the listed reasons for inappropriate length of stay apply, write the actual reason in the margin of the form.
QUESTION 7: Assessing the Preventability of the Patient's Death.

PURPOSE

The purpose of this question is to assess whether the patient's death was preventable. Assume that the patient's outcome (what happens to him/her) depends upon three factors:

(a) the patient's degree of sickness at admission
(b) the treatability of the patient's condition by medical science (given the best of circumstances)
(c) the processes of care delivered to the patient during the hospital stay.

In the event that an egregious error leading to death was made in the delivery of care to this patient, then this may be an easy question to answer. However, also consider the situation where a series of smaller errors of omission or commission produced poor care. This too could represent a preventable death if the patient was viable enough to have survived with better care. In answering this question avoid the bias that all deaths are preventable given medical science in the 1980s. This just is not so.

DATA SOURCES

Use all relevant information in the medical record to address this question.

RATING SCALE

Definitely Preventable: Definitely Preventable means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have survived if adequate care had been given.

Probably Preventable: Probably Preventable means that the
patient's level of sickness and the treatability of the condition were such that the patient was likely to have survived only if optimal care had been given.

_Probably Not Preventable:_ *Probably Not Preventable* means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have died if adequate care had been given.

_Definitely Not Preventable:_ *Definitely Not Preventable* means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have died despite optimal care.
QUESTION 8: Assessing the Patient's Outcome at Discharge.

PURPOSE
This question focuses on outcomes at discharge given the level of sickness at the time of admission and the treatability of the condition. In rating this question ignore the processes of care that were actually delivered. Base your rating on the most likely outcome for the patient in relation to the patient's actual outcome, given the level of sickness at the time of admission and the treatability of the condition.

DATA SOURCE
Use all relevant information in the medical record to address this question.
QUESTIONS 9-10: *Overall Assessment.*

PURPOSE

The purpose of Questions 9-10 is for you to specify your overall assessment of the care delivered to this patient.

DATA SOURCES

Use all relevant information in the medical record to address questions 9-10.

QUESTION 9: *Rate Overall Quality of Care.*

This question addresses the overall care delivered to the patient, considering processes and outcomes.

QUESTION 10: *Would You Send Your Mother?*

This question is designed to integrate your thought and judgment with your feelings and intuition.
1) Please rate the quality of physician and nurse documentation of each of the following: patient's prior and chronic disease, functional status, habits, and psychosocial status prior to the current acute illness.

<table>
<thead>
<tr>
<th>excellent</th>
<th>good</th>
<th>adequate</th>
<th>poor</th>
<th>very poor</th>
</tr>
</thead>
<tbody>
<tr>
<td>(1)</td>
<td>(2)</td>
<td>(3)</td>
<td>(4)</td>
<td>(5)</td>
</tr>
</tbody>
</table>

   a) physician documentation of prior and chronic disease (e.g., osteoporosis, Paget's disease, heart disease) [15/]
   b) physician documentation of functional status (e.g., ambulation) [16/]
   c) physician documentation of habits (e.g., alcohol, smoking, diet) [17/]
   d) physician documentation of psychosocial status (e.g., dementia, depression, nursing home residence) [18/]
   e) nurse documentation of prior and chronic disease, functional status, habits, and psychosocial status [19/]

   f) Check here if the record demonstrates evidence that the physician has ready access to additional records that supplement the current data regarding the patient's prior condition. [20/]

2) Please rate the completeness of the physician initial assessment of the hip fracture and of acute medical problems present at admission. Base your answer on the history, physical, and labs.

<table>
<thead>
<tr>
<th>excellent</th>
<th>good</th>
<th>adequate</th>
<th>poor</th>
<th>very poor</th>
</tr>
</thead>
<tbody>
<tr>
<td>(1)</td>
<td>(2)</td>
<td>(3)</td>
<td>(4)</td>
<td>(5)</td>
</tr>
</tbody>
</table>

   a) hip fracture [21/]
   b) acute medical problems [22/]

3) Considering the entire hospitalization, on average, was use of these services appropriate with respect to the patient's needs? If not appropriate, was it because of underuse?

<table>
<thead>
<tr>
<th>Service</th>
<th>definitely yes (1)</th>
<th>probably yes (2)</th>
<th>probably no (3)</th>
<th>definitely no (4)</th>
<th>under-use</th>
</tr>
</thead>
<tbody>
<tr>
<td>a) monitoring intensity</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>a) 23/</td>
</tr>
<tr>
<td>aii) intensive care</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>aii) telemetry without intensive care</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>b) respiratory therapy delivered</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>b) 26-27/</td>
</tr>
<tr>
<td>c) (O_2) and ventilation</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>c) 28-29/</td>
</tr>
<tr>
<td>d) arterial blood gases</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>d) 30-31/</td>
</tr>
<tr>
<td>e) physical therapy delivered</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>e) 32-33/</td>
</tr>
<tr>
<td>f) EKGs</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>f) 34-35/</td>
</tr>
<tr>
<td>g) chest x-rays</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>g) 36-37/</td>
</tr>
<tr>
<td>h) hip x-rays</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>h) 38-39/</td>
</tr>
<tr>
<td>i) venous blood tests, urinalyses, sputum analyses</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>i) 40-41/</td>
</tr>
<tr>
<td>j) consultations</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>j) 42-43/</td>
</tr>
<tr>
<td>k) medications (type and route)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>k) 44-45/</td>
</tr>
</tbody>
</table>
4) Was the choice of surgical or nonsurgical treatment appropriate? Was the type of operation performed appropriate? Was the patient adequately stabilized prior to surgery? Was the technical quality of the operation adequate?

<table>
<thead>
<tr>
<th></th>
<th>definitely yes</th>
<th>probably yes</th>
<th>probably no</th>
<th>definitely no</th>
<th>not applicable</th>
</tr>
</thead>
<tbody>
<tr>
<td>a) appropriate treatment choice (surgical vs nonsurgical)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>b) appropriate type of operation</td>
<td></td>
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<td></td>
<td></td>
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<tr>
<td>c) adequate stabilization prior to surgery</td>
<td></td>
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<td></td>
<td></td>
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<tr>
<td>d) adequate technical quality of the operation</td>
<td></td>
<td></td>
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</tbody>
</table>

**46/**

**47/**

**48/**

**49/**

**ANSWER QUESTION 5 ONLY IF THE PATIENT WAS DISCHARGED ALIVE**

5) Was length of stay appropriate given the patient's status at discharge and disposition plans?

<table>
<thead>
<tr>
<th></th>
<th>definitely yes</th>
<th>probably yes</th>
<th>probably no</th>
<th>definitely no</th>
</tr>
</thead>
</table>

**50/**

5a) If probably or definitely not appropriate, how would you describe length of stay?

<p>| | |</p>
<table>
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<tr>
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<tbody>
<tr>
<td>too short</td>
<td></td>
</tr>
<tr>
<td>too long</td>
<td></td>
</tr>
</tbody>
</table>

**51/**
5b) If length of stay was too short or too long, what were the apparent reasons? Check one or more reasons if applicable.

<table>
<thead>
<tr>
<th>Too short</th>
<th>Too long</th>
</tr>
</thead>
<tbody>
<tr>
<td>i) Patient too unstable</td>
<td>v) Waiting for nursing home or ECF bed</td>
</tr>
<tr>
<td>ii) Work-up incomplete</td>
<td>vi) Waiting for home care support service</td>
</tr>
<tr>
<td>iii) Rehabilitation incomplete</td>
<td>vii) Patient or family refused discharge</td>
</tr>
<tr>
<td>iv) Patient or family insisted on discharge</td>
<td>viii) Waiting for procedure</td>
</tr>
</tbody>
</table>

**ANSWER QUESTION 6 ONLY IF THE PATIENT DIED DURING THE HOSPITALIZATION**

6) Was the patient's death preventable?

- definitely preventable ___ (1)
- probably preventable ___ (2)
- probably not preventable ___ (3)
- definitely not preventable ___ (4)

**ANSWER THE REMAINING QUESTIONS FOR ALL PATIENTS**

7) How would you characterize the patient's outcome at discharge?

- much better than expected ___ (1)
- better than expected ___ (2)
- as expected ___ (3)
- worse than expected ___ (4)
- much worse than expected ___ (5)

8) Considering everything you know about this patient, please rate overall quality of care.

- extreme, above standard ___ (1)
- above standard ___ (2)
- adequate ___ (3)
- below standard ___ (4)
- extreme, below standard ___ (5)

9) Would you send your mother to these physicians in this hospital?

- definitely yes ___ (1)
- probably yes ___ (2)
- probably no ___ (3)
- definitely no ___ (4)
STRUCTURED IMPLICIT REVIEW GUIDELINES FOR HIP FRACTURE

QUESTION 1: Assessing physicians' and nurses' documentation of health status prior to the acute episode of illness.

PURPOSE

For this question, you are asked to rate how adequate the physicians' notes (Items 1a, 1b, 1c, and 1d) and the nurses' notes (Item 1e) are in allowing you to assess this patient's health status prior to the acute episode of illness. To assign this rating, assume you are asked to cover for the attending physician. Your ability to determine diagnostic and therapeutic plans for this patient depends upon your understanding of the patient's pre-hospital and acute conditions. This question asks how adequately the record provides you the information you need to know about the patient's status prior to the acute episode in order for you to adequately care for the patient.

This question tries to assess the quality of documentation of past medical history. There will not always be a clearly defined separation between past medical history and history of the acute illness. We define past medical history as including the history of the illness causing the admission (the morbid condition) up to the point at which the current acute deterioration occurred. Our definition of past medical history also includes the history of comorbid conditions.

For each disease and for each patient, the pertinent positives and pertinent negatives that you believe are important will vary according to the patient's pre-hospital and current conditions. Thus, the level of documentation necessary to assign a particular rating (e.g. excellent) should vary for each case since each patient's unique clinical picture will influence the amount and kind of documentation you believe is necessary.
Initial assessment refers to data that were gathered "close" to the time of admission. For acutely ill patients, this period generally includes only the 24 hours after admission.

DATA SOURCES

As data sources for this question use physicians' admitting history and physical, the emergency room notes, and any physician consult reports (notes) that evaluated the patient at admission.

If the patient's level of consciousness limits access to information about the patient, you may assign your rating according to the amount of documentation regarding attempts to gather the appropriate data.

If the patient has had multiple hospitalizations by the attending physician, it is acceptable to acknowledge a reference to old records. However, critical items should be restated.

Data sources for physician assessment of prior health status:

- Evaluate any data you find in the physician notes. In addition to the history and physical and emergency room notes, you may include physician progress notes, consultations and/or discharge summaries. Include anesthesiologist report.
- When there is more than one data source, use all of the available data to assign your rating.
- If the patient was too sick to provide information, consider whether efforts to contact family, etc., were made. If the latter were unnecessary given the patient's circumstance, incorporate this into your rating.

RATING SCALE

Excellent: Assign Excellent if you, as the physician covering for this patient, believe you do not have to gather any further data about the patient's pre-hospital status in order to make adequate diagnostic and therapeutic decisions.
Good: Between Excellent and Adequate

Adequate: Assign Adequate if you, as the physician covering for this patient, believe you must gather some additional data in order to accurately assess pre-hospital status as it pertains to your diagnostic and therapeutic decision-making about this patient.

Poor: Between Adequate and Very Poor

Very Poor: Assign Very Poor if you, as the physician covering for this patient, believe you would have to repeat the initial patient assessment and obtain your own medical history of pre-hospital status in order to make diagnostic and therapeutic decisions.

SPECIFIC ITEMS
Item 1a: Documentation of Prior and Chronic Disease(s)

Item 1a asks you to rate the quality of physician documentation regarding prior and chronic disease(s). Prior disease means a past history of a significant medical problem, even if it was episodic. Some examples of prior disease include prior surgery or a prior episode of respiratory failure. Chronic diseases are ongoing medical illnesses such as diabetes, hypertension, chronic obstructive pulmonary disease, or chronic lymphocytic leukemia.

The list of pertinent positive and negative findings will depend upon the patient's clinical circumstances. For example, it might be important to deny a history of tuberculosis in a pneumonia patient with cavitary lesions, but not important in a patient with an acute myocardial infarction.

Item 1b: Documentation of Functional Status

Item 1b asks you to rate the quality of physician documentation of functional status.
By functional status, we mean documentation of a patient's ability to carry out the usual activities of daily life, such as walking, eating, bathing, dressing, or toileting (i.e. continence). For purposes of this form, mental status and residence are not considered to be part of functional status. The latter are considered measures of psychosocial status (see below, Item 1d).

It is well known that functional status is generally poorly documented in the medical record. Judge these records, however, in comparison to what you think the records should contain to take adequate care of the patient. For example, assign an Excellent rating if the record has provided you all the information necessary about functional status in order to make diagnostic and therapeutic plans (including prognostication) for this patient.

**Item 1c: Documentation of Habits**

Item 1c asks you to rate the quality of physician documentation of patient habits prior to the acute episode of illness. Some examples of documentation regarding habits include a description of alcohol use, smoking, diet, exercise, employment, hobbies, exposures, and compliance.

Again, compare these records to your own standards for what records should contain in order to facilitate adequate clinical care.

**Item 1d: Documentation of Psychosocial Status**

Item 1d asks you to rate the quality of physician documentation of this patient's psychosocial status prior to the acute episode. Some examples of psychosocial status include a description of mental status (e.g., dementia), mood (e.g., depression), residence (e.g., nursing home).

**Item 1e: Nursing Documentation**

Item 1e asks you to rate the quality of nurses' documentation of all of the parameters described in 1a through 1d. In some medical records, this information is in a nursing intake survey, frequently (but not always) found at the beginning of nurses' notes. In others, this
QUESTION 2: *Assessing the completeness of the physicians' initial assessment of the hip fracture and of acute medical problems at admission.*

PURPOSE

The purpose of Question 2 is to qualitatively assess the physicians' initial approach to the patient (i.e., attentiveness in gathering data about the hip fracture at admission, Item 2a, and about the acute medical problems at admission, Item 2b).

You should rate each of the components of this question separately. Thus, it is possible for you to rate one item as *Excellent* and another item as *Very Poor*.

DATA SOURCES

As data sources for this question, use the physicians' history and physical, laboratory data as provided in the record from the time of admission, emergency room physician work-ups, and physician consult notes if these were performed close enough to the time of admission. Depending upon the time of arrival at the hospital, the time of admission may mean the first or the first and second days of admission.

If the qualities of the physicians' initial assessments are discrepant (e.g., the emergency room physician's assessment is excellent and the attending physician's assessment is very poor), then assign your rating by integrating the assessments from the various physicians, but weigh the physicians' assessments according to how important each was in determining care for the patient.

RATING SCALE

For both Items 2a and 2b you are asked to assess the degree to which you believe the physician gathered the data about this patient that were necessary to develop an adequate diagnostic and therapeutic plan. Do not evaluate documentation of health status prior to the acute episode of illness in Item 2. Documentation of prior and chronic disease is evaluated in Item 1a.
Excellent: Assign Excellent if the record documents all
of the information necessary to formulate an adequate
diagnostic and therapeutic plan. If you were covering for
this physician, you would not need any supplementary data
in order to develop an adequate diagnostic and therapeutic plan.

Good...Adequate...Poor: Interpolate

Very Poor: Assign Very Poor if the record so poorly documents
the information necessary to formulate an adequate diagnostic and
therapeutic plan, that you would need to start from the beginning,
at the bedside, and gather the data yourself.
QUESTION 3: **Assessing the appropriateness of the use of services.**

**PURPOSE**

The purpose of this question is to assess the appropriateness of the use of each of the specified services. To assign your rating, consider the utility, intensity, and timing of the services, overall, throughout the hospital stay.

**DATA SOURCES**

Use any relevant physician, nursing, or ancillary service notes. In addition, use relevant graphics; flow sheets; and laboratory, pathology, EKG, and X-ray reports.

**RATING SCALE**

*Definitely Yes:* **Definitely Yes** means the use (or lack of use) of the service matched your ideal of how this service should have been used for the maximal benefit of the patient.

*Probably Yes:* **Probably Yes** means the use (or lack of use) of the service approximated but did not match your ideal of how this service should have been used for the maximal benefit of the patient.

*Probably No:* **Probably No** means the use (or lack of use) of the service fell short of your ideal of how this service should have been used.

*Definitely No:* **Definitely No** means the use (or lack of use) of the service was likely to have resulted in harm to the patient.
Underuse: Underuse means that the patient might have had an improved health status with more extensive use of the service.

Examples

1) If you believe a service should have been utilized and was utilized, then assign a rating of Definitely or Probably Yes.
2) If you believe a service should have been utilized, but the service was not utilized, then assign a rating of Probably or Definitely No. Then complete column (v) and indicate that the problem was Underuse.

SPECIFIC ITEMS

Intensive care and telemetry without intensive care: If you believe the patient should have been placed in intensive care and the patient was only placed in an intermediate care unit with telemetry, then both intensive care and telemetry without intensive care were inappropriately used for this patient and you should assign a rating of Probably or Definitely No to both. Then complete column (v) and indicate that the problem with intensive care was Underuse. Leave column (v) unchecked for telemetry without intensive care because this service was not underused.

Respiratory therapy delivered: Respiratory therapy delivered refers to the therapy received by the patient and is based on physicians' orders and the delivery of therapy by the respiratory therapist or nurse. For respiratory therapy, include the use of intermittent positive pressure breathing (IPPB); hand-held nebulizer (HHN); ultrasonic or aerosol therapy; incentive spirometer (IS); or postural drainage and percussion (PD&P).

O₂ and Ventilation: Ventilation refers to intubation with mechanical ventilation. O₂ refers to oxygen therapy by mask, nasal cannula, or prongs.
Physical therapy delivered: Base your assessment on both the physicians' orders and the delivery of therapy by the physical therapist or nurse.
QUESTION 4: Assessing the appropriateness and adequacy of the hip fracture treatment.

PURPOSE
The purpose of this question is to assess the appropriateness and adequacy of treatment for the hip fracture. To assign your rating, consider the use of treatments, overall, throughout the hospital stay.

If the patient had more than one orthopedic surgical procedure, assign your rating based on all of the procedures.

DATA SOURCES
Use any relevant physician, nursing, or ancillary service notes. In addition, use relevant graphics; flow sheets; and laboratory, pathology, EKG, and X-ray reports.

RATING SCALE
You are asked to rate appropriateness or adequacy for each of the items regarding treatment of the hip fracture.

Definitely Yes: Definitely Yes means the treatment matched your ideal of what should have been done for the maximal benefit of the patient.

Probably Yes: Probably Yes means the treatment approximated but did not match your ideal of what should have been done.

Probably No: Probably No means the treatment fell short of your ideal of what should have been done.

Definitely No: Definitely No means the treatment was likely to have resulted in harm to the patient.

Not Applicable: Use Not Applicable for Items 4b-d if the patient did not receive surgical treatment for the hip fracture.
QUESTION 5: Assessing the Adequacy of the Length of the Hospital Stay.

PURPOSE

The purpose of this question is to assess the adequacy of the length of the hospital stay.

DATA SOURCES

Use all relevant information in the medical record to address this question.

RATING SCALE

Definitely Yes: A rating of Definitely Yes means that the patient was discharged at the right time considering the benefits and risks of hospitalization. The patient did not stay in the hospital too long given his/her status in the days prior to discharge and the disposition plans for the patient. In addition, the patient was not discharged too soon. This rating means that the patient definitely benefited more than suffered as a result of the length of stay.

Probably Yes: A rating of Probably Yes means that the patient probably benefited more than suffered as a result of the length of stay.

Probably No: A rating of Probably No means that the patient probably suffered more than benefited as a result of the length of stay.

Definitely No: A rating of Definitely No means that the patient definitely suffered more than benefited as a result of the length of stay.
Too short: A rating of Too short means that the patient had a significant chance of adverse health consequences that might have been avoided had the patient remained in the hospital longer.

Too long: A rating of Too long means that the patient remained in the hospital beyond the point of maximal benefit.

Note
If the patient was transferred to another acute care hospital for further care, assign a rating of Probably Yes.

SPECIFIC ITEMS
Item 5b
Apparent reasons for too short length of stay

• Patient too unstable for level of care to which he/she is being discharged
• Work-up incomplete and unlikely to be completed after discharge
• Rehabilitation incomplete and unlikely to be completed after discharge
• Patient or family insisted on discharge

Apparent reasons for too long length of stay

• Awaiting bed at nursing home or extended care facility
• Awaiting preparation of home care support services
• Patient or family refused discharge
• Awaiting specific diagnostic or therapeutic procedure

If none of the listed reasons for inappropriate length of stay apply, write the actual reason in the margin of the form.
QUESTION 6: Assessing the Preventability of the Patient's Death

PURPOSE

The purpose of this question is to assess whether the patient's death was preventable. Assume that the patient's outcome (what happens to him/her) depends upon three factors:

(a) the patient's degree of sickness at admission
(b) the treatability of the patient's condition by medical science (given the best of circumstances)
(c) the processes of care delivered to the patient during the hospital stay.

In the event that an egregious error leading to death was made in the delivery of care to this patient, then this may be an easy question to answer. However, also consider the situation where a series of smaller errors of omission or commission produced poor care. This too could represent a preventable death if the patient was viable enough to have survived with better care. In answering this question avoid the bias that all deaths are preventable given medical science in the 1980s. This just is not so.

DATA SOURCES

Use all relevant information in the medical record to address this question.
RATING SCALE

*Definitely Preventable:* Definitely Preventable means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have survived if adequate care had been given.

*Probably Preventable:* Probably Preventable means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have survived only if optimal care had been given.

*Probably Not Preventable:* Probably Not Preventable means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have died if adequate care had been given.

*Definitely Not Preventable:* Definitely Not Preventable means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have died despite optimal care.
QUESTION 7: Assessing the Patient's Outcome at Discharge.

PURPOSE

This question focuses on outcomes at discharge given the level of sickness at the time of admission and the treatability of the condition. In rating this question ignore the processes of care that were actually delivered. Base your rating on the most likely outcome for the patient in relation to the patient's actual outcome, given the level of sickness at the time of admission and the treatability of the condition.

DATA SOURCE

Use all relevant information in the medical record to address this question.
QUESTIONS 8-9: *Overall Assessment.*

PURPOSE

The purpose of Questions 8-9 is for you to specify your overall assessment of the care delivered to this patient.

DATA SOURCES

Use all relevant information in the medical record to address questions 8-9.

QUESTION 8: *Rate Overall Quality of Care*

This question addresses the overall care delivered to the patient, considering processes and outcomes.

QUESTION 9: *Would You Send Your Mother?*

This question is designed to integrate your thought and judgment with your feelings and intuition.
DRG/QC STUDY
IMPLICIT REVIEW FORM
CEREBROVASCULAR ACCIDENT

Case ID: CVA 5

Review Date 4-8/9-14
Month Day Year

1) Please rate the quality of physician documentation of each of the following: patient's prior and chronic disease and functional status prior to the current acute illness.

<table>
<thead>
<tr>
<th>excellent (1)</th>
<th>good (2)</th>
<th>adequate (3)</th>
<th>poor (4)</th>
<th>very poor (5)</th>
</tr>
</thead>
<tbody>
<tr>
<td>a) physician documentation of prior and chronic disease</td>
<td></td>
<td></td>
<td></td>
<td>15/</td>
</tr>
<tr>
<td>b) physician documentation of functional status (e.g., ambulation)</td>
<td></td>
<td></td>
<td></td>
<td>16/</td>
</tr>
<tr>
<td>c) Check here if the record demonstrates evidence that the physician has ready access to additional records that supplement the current data regarding the patient's prior condition.</td>
<td></td>
<td></td>
<td></td>
<td>17/</td>
</tr>
</tbody>
</table>

2) Please rate the physician initial assessment of acute medical problems present at admission. Base your answer on the history, physical, and labs.

<table>
<thead>
<tr>
<th>excellent (1)</th>
<th>good (2)</th>
<th>adequate (3)</th>
<th>poor (4)</th>
<th>very poor (5)</th>
</tr>
</thead>
<tbody>
<tr>
<td>a) completeness of initial data gathering</td>
<td></td>
<td></td>
<td></td>
<td>18/</td>
</tr>
<tr>
<td>b) integration of admission information and development of appropriate diagnoses</td>
<td></td>
<td></td>
<td></td>
<td>19/</td>
</tr>
<tr>
<td>c) initial treatment plan and initial orders</td>
<td></td>
<td></td>
<td></td>
<td>20/</td>
</tr>
</tbody>
</table>

3) Assume adequate to optimal care and assume the patient recovers from this CVA. What do you believe is this patient's life expectancy?

| < 1 month | (1) | 21/ |
| 1-6 months | (2) |
| > 6 months-1 year | (3) |
| > 1 year | (4) |
4) Assume adequate to optimal care by the physician and hospital. How effective is medical science in treating this patient's acute illness or in preventing worsened health status due to the illness? Consider the severity of the patient's acute illness and the patient's chronic reserve.

<table>
<thead>
<tr>
<th>Option</th>
<th>(1)</th>
<th>(2)</th>
<th>(3)</th>
<th>(4)</th>
</tr>
</thead>
<tbody>
<tr>
<td>very effective</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>effective</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>not so effective</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>very ineffective</td>
<td></td>
<td></td>
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<td></td>
</tr>
</tbody>
</table>

22/

5) Considering the entire hospitalization, on average, was use of these services appropriate with respect to the patient's needs? If not appropriate, was it because of underuse?

<table>
<thead>
<tr>
<th>Service</th>
<th>definitely yes (1)</th>
<th>probably yes (2)</th>
<th>probably no (3)</th>
<th>definitely no (4)</th>
<th>under-use</th>
</tr>
</thead>
<tbody>
<tr>
<td>a) neurologic examination</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>a)</td>
</tr>
<tr>
<td>b) monitoring intensity</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>b)</td>
</tr>
<tr>
<td>bii) intensive care</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>bii)</td>
</tr>
<tr>
<td>bii) telemetry without intensive care</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>c) respiratory therapy delivered</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>c)</td>
</tr>
<tr>
<td>d) O₂ and ventilation</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>d)</td>
</tr>
<tr>
<td>e) arterial blood gases</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>e)</td>
</tr>
<tr>
<td>f) physical or occupational therapy delivered</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>f)</td>
</tr>
<tr>
<td>g) speech therapy delivered</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>g)</td>
</tr>
<tr>
<td>h) EKGs</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>h)</td>
</tr>
<tr>
<td>i) chest x-rays</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>i)</td>
</tr>
<tr>
<td>j) venous blood tests, urinalyses, sputum analyses</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>j)</td>
</tr>
<tr>
<td>k) consultations</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>k)</td>
</tr>
<tr>
<td>l) angiography</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>l)</td>
</tr>
<tr>
<td>m) non-invasive tests</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>m)</td>
</tr>
<tr>
<td>n) CT/MRI</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>n)</td>
</tr>
<tr>
<td>o) medications (type and route)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>o)</td>
</tr>
</tbody>
</table>

23-24/

25/

26/

27/

28-29/

30-31/

32-33/

34-35/

36-37/

38-39/

40-41/

42-43/

44-45/

46-47/

48-49/

50-51/

52-53/
ANSWER QUESTION 6 AND 7 ONLY IF THE PATIENT WAS DISCHARGED ALIVE

6) Was length of stay appropriate given the patient’s status at discharge and disposition plans?

- definitely yes ____ (1)
- probably yes ____ (2)
- probably no ____ (3)
- definitely no ____ (4)

6a) If probably or definitely not appropriate, how would you describe length of stay?

- too short ____ (1)
- too long ____ (2)

6b) If length of stay was too short or too long, what were the apparent reasons? Check one or more reasons if applicable.

<table>
<thead>
<tr>
<th>Too short</th>
<th>Too long</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>i) Patient too unstable</td>
<td>v) Waiting for nursing home or ECF bed</td>
<td>56-57/</td>
</tr>
<tr>
<td>ii) Work-up incomplete</td>
<td>vi) Waiting for home care support service</td>
<td>58-59/</td>
</tr>
<tr>
<td>iii) Rehabilitation incomplete</td>
<td>vii) Patient or family refused discharge</td>
<td>60-61/</td>
</tr>
<tr>
<td>iv) Patient or family insisted on discharge</td>
<td>viii) Waiting for procedure</td>
<td>62-63/</td>
</tr>
</tbody>
</table>

7) How would you characterize the patient’s functioning at discharge?

- not disabled ____ (1)
- somewhat disabled ____ (2)
- very disabled, but not bedridden ____ (3)
- bedridden ____ (4)

ANSWER QUESTION 8 ONLY IF THE PATIENT DIED DURING THE HOSPITALIZATION

8) Was the patient’s death preventable?

- definitely preventable ____ (1)
- probably preventable ____ (2)
- probably not preventable ____ (3)
- definitely not preventable ____ (4)
ANSWER THE REMAINING QUESTIONS FOR ALL PATIENTS

9) How would you characterize the patient's outcome at discharge?

much better than expected ___ (1) 66/
better than expected ___ (2)
as expected ___ (3)
worse than expected ___ (4)
much worse than expected ___ (5)

10) Considering everything you know about this patient, please rate overall quality of care.

extreme, above standard ___ (1) 67/
above standard ___ (2)
adequate ___ (3)
below standard ___ (4)
extreme, below standard ___ (5)

11) Would you send your mother to these physicians in this hospital?

definitely yes ___ (1) 68/
probably yes ___ (2)
probably no ___ (3)
definitely no ___ (4)
STRUCTURED IMPLICIT REVIEW GUIDELINES FOR CEREBROVASCULAR ACCIDENT

QUESTION 1: Assessing physicians' and nurses' documentation of health status prior to the acute episode of illness.

PURPOSE

For this question, you are asked to rate how adequate the physicians' notes (Items 1a, 1b, 1c, and 1d) and the nurses' notes (Item 1e) are in allowing you to assess this patient's health status prior to the acute episode of illness. To assign this rating, assume you are asked to cover for the attending physician. Your ability to determine diagnostic and therapeutic plans for this patient depends upon your understanding of the patient's pre-hospital and acute conditions. This question asks how adequately the record provides you the information you need to know about the patient's status prior to the acute episode in order for you to adequately care for the patient.

This question tries to assess the quality of documentation of past medical history. There will not always be a clearly defined separation between past medical history and history of the acute illness. We define past medical history as including the history of the illness causing the admission (the morbid condition) up to the point at which the current acute deterioration occurred. Our definition of past medical history also includes the history of comorbid conditions.

For each disease and for each patient, the pertinent positives and pertinent negatives that you believe are important will vary according to the patient's pre-hospital and current conditions. Thus, the level of documentation necessary to assign a particular rating (e.g. excellent) should vary for each case since each patient's unique clinical picture will influence the amount and kind of documentation you believe is necessary.
DATA SOURCES

As data sources for this question use physicians' admitting history and physical, the emergency room notes, and any physician consult reports (notes) that evaluated the patient at admission.

If the patient's level of consciousness limits access to information about the patient, you may assign your rating according to the amount of documentation regarding attempts to gather the appropriate data.

If the patient has had multiple hospitalizations by the attending physician, it is acceptable to acknowledge a reference to old records. However, critical items should be restated.

RATING SCALE

Excellent: Assign Excellent if you, as the physician covering for this patient, believe you do not have to gather any further data about the patient's pre-hospital status in order to make adequate diagnostic and therapeutic decisions.

Good: Between Excellent and Adequate

Adequate: Assign Adequate if you, as the physician covering for this patient, believe you must gather some additional data in order to accurately assess pre-hospital status as it pertains to your diagnostic and therapeutic decision-making about this patient.

Poor: Between Adequate and Very Poor

Very Poor: Assign Very Poor if you, as the physician covering for this patient, believe you would have to repeat the initial patient assessment and obtain your own medical history of pre-hospital status in order to make diagnostic and therapeutic decisions.
SPECIFIC ITEMS

Item 1a: Documentation of Prior and Chronic Disease(s)

Item 1a asks you to rate the quality of physician documentation regarding prior and chronic disease(s). Prior disease means a past history of a significant medical problem, even if it was episodic. Some examples of prior disease include prior surgery or a prior episode of respiratory failure. Chronic diseases are ongoing medical illnesses such as diabetes, hypertension, chronic obstructive pulmonary disease, or chronic lymphocytic leukemia.

The list of pertinent positive and negative findings will depend upon the patient's clinical circumstances. For example, it might be important to deny a history of tuberculosis in a pneumonia patient with cavitary lesions, but not important in a patient with an acute myocardial infarction.

Item 1b: Documentation of Functional Status

Item 1b asks you to rate the quality of physician documentation of functional status.

By functional status, we mean documentation of a patient's ability to carry out the usual activities of daily life, such as walking, eating, bathing, dressing, or toileting (i.e. continence). For purposes of this form, mental status and residence are not considered to be part of functional status. The latter are considered measures of psychosocial status (see below, Item 1d).

It is well known that functional status is generally poorly documented in the medical record. Judge these records, however, in comparison to what you think the records should contain to take adequate care of the patient. For example, assign an Excellent rating if the record has provided you all the information necessary about functional status in order to make diagnostic and therapeutic plans (including prognostication) for this patient.
QUESTION 2: Assessing the physicians' initial assessment of acute medical problems at admission.

PURPOSE

The purpose of Question 2 is to qualitatively assess the physicians' initial approach to the patient. The question is designed to distinguish three components of the physicians' approach:

(a) the physician as gatherer of initial data (Item 2a)
(b) the physicians' performance in integrating the available data into an appropriate initial diagnostic formulation (Item 2b)
(c) the development of an appropriate initial therapeutic plan (Item 2c)

You should rate each of the three components of this question separately. Thus, it is possible for you to rate one of these three items as Excellent and another item as Very Poor.

DATA SOURCES

As data sources for this question, use the physicians' history and physical, laboratory data as provided in the record from the time of admission, emergency room physician work-ups, physician consult notes if these were performed close enough to the time of admission, and physician initial orders. Depending upon the time of arrival at the hospital, the time of admission may mean the first or the first and second days of admission.

If the qualities of the physicians' initial assessments are discrepant (e.g., the emergency room physician's assessment is excellent and the attending physician's assessment is very poor), then assign your rating by integrating the assessments from the various physicians, but weigh the physicians' assessments according to how important each was in determining care for the patient.
RATING SCALE FOR SPECIFIC ITEMS

Item 2a: Completeness of Initial Data Gathering

Item 2a asks you to rate the completeness of initial data gathering. You are asked to assess the degree to which the physician gathered the data about the patient's acute illness episode that were necessary to develop an adequate diagnostic and therapeutic plan. Do not evaluate documentation of health status prior to the acute episode of illness in Item 2a. Documentation of prior and chronic disease is evaluated in Item 1a.

Assign Excellent if the record documents all of the information necessary to formulate an adequate diagnostic and therapeutic plan. If you were covering for this physician, you would not need to gather any supplementary data in order to develop an adequate diagnostic and therapeutic plan.

Good...Adequate...Poor: Interpolate

Assign Very Poor if the record so poorly documents the information necessary to formulate an adequate diagnostic and therapeutic plan, that you would need to start from the beginning, at the bedside, and gather the data yourself.

Item 2b: Integration of Information and Development of Diagnoses

Item 2b asks you to rate the adequacy with which the available initial data about the patient were integrated to develop appropriate diagnostic likelihoods. You are asked to use your judgement, given the data available, to rate whether you believe the physician established the correct diagnosis(es) based on the patient's initial presentation. Although a physician may be commended for describing a long list of differential diagnoses, this question asks whether the physician named the correct set of diagnoses or diagnostic possibilities, given the data available at the time of admission.

Assign Excellent if you believe the physicians named the correct diagnosis(es) or the correct set of differential diagnoses.
Good...Adequate...Poor: Interpolate

Assign Very Poor if you believe the physicians' initial diagnostic assessment did not reflect the severity or the kind of illness with which the patient presented.

Item 2c: Initial Treatment Plan

Item 2c asks you to rate the adequacy of the initial treatment plan and the adequacy of the orders written to implement the treatment plan.
QUESTION 3: Assessing patient complexity at the time of hospital admission.

PURPOSE

The purpose of this question is to evaluate the patient's complexity at the time of admission by estimating the patient's life expectancy. Complexity is defined by the patient's chronic disease burden and the severity of the acute illness. Do not consider the patient's hospital course or outcome at discharge in estimating life expectancy.

To allow you to focus on the patient's degree of sickness at admission as a predictor of outcomes, rather than focusing on processes of care, we hold processes of care constant while rating this question. This means you should look only at data that apply to the patient’s condition on admission, and assume the patient will receive adequate to optimal care.

DATA SOURCES

Use any information available in the medical record that will provide data about the patient's prior and chronic disease and about the patient's severity at admission. Use these data to estimate this patient's life expectancy while assuming the patient received adequate to optimal care.

RATING SCALE

Answer this question for patients alive and for those deceased at the time of discharge. If you assign a rating of "> 1 year life expectancy" (even to patients who died during the hospitalization), this means that, on average, you believe that the majority of patients hospitalized with the level of sickness of this patient would have survived > 1 year if they had received adequate to optimal care. The phrase "on average" is important here.
QUESTION 4: Assessing the effectiveness of medical science in treating this patient's acute illness.

PURPOSE

The purpose of this question is to estimate the effectiveness of adequate to optimal inpatient medical care in treating this patient's acute medical problems and in preventing worsening health status due to the illness. Pay particular attention to the severity of the patient's acute illness and the patient's chronic reserve.

DATA SOURCES

Use any data available in the medical record that provide information about the severity of the patient's acute illness and the patient's chronic reserve. Use your own judgment about the effectiveness of medical science for this patient's condition.

RATING SCALE

*Very Effective:* Very Effective means that you believe that more than 90% of patients hospitalized with the disease burden of this patient, who were also treated with adequate to optimal care, would be discharged alive and with the expectation that the patient's post hospital status would be about the same as it was prior to admission.

*Effective:* Effective means that 50-90% of patients with the disease burden of this patient would be discharged alive and with a health status similar to that prior to admission.

*Not So Effective:* Not So Effective means that most patients with the disease burden of this patient would be discharged alive but with a worsened health status than that prior to admission.
Very Ineffective: Very Ineffective means that most patients with the disease burden of this patient would be likely to die despite adequate to optimal care.
QUESTION 5: Assessing the appropriateness of the use of services.

PURPOSE

The purpose of this question is to assess the appropriateness of the use of each of the specified services. To assign your rating, consider the utility, intensity, and timing of the services overall, throughout the hospital stay.

DATA SOURCES

Use any relevant physician, nursing, or ancillary service notes. In addition, use relevant graphics; flow sheets; and laboratory, pathology, EKG, and X-ray reports.

RATING SCALE

Definitely Yes: Definitely Yes means the use (or lack of use) of the service matched your ideal of how this service should have been used for the maximal benefit of the patient.

Probably Yes: Probably Yes means the use (or lack of use) of the service approximated but did not match your ideal of how this service should have been used for the maximal benefit of the patient.

Probably No: Probably No means the use (or lack of use) of the service fell short of your ideal of how this service should have been used.

Definitely No: Definitely No means the use (or lack of use) of the service was likely to have resulted in harm to the patient.
Underuse: *Underuse* means that the patient might have had an improved health status with more extensive use of the service.

**Examples**

1) If you believe a service should have been utilized and was utilized, then assign a rating of *Definitely* or *Probably Yes*

2) If you believe a service should have been utilized, but the service was not utilized, then assign a rating of *Probably* or *Definitely No*. Then complete column (v) and indicate that the problem was *Underuse*.

**SPECIFIC ITEMS**

**Intensive care** and **telemetry without intensive care**: If you believe the patient should have been placed in intensive care and the patient was only placed in an intermediate care unit with telemetry, then both intensive care and telemetry without intensive care were inappropriately used for this patient and you should assign a rating of *Probably* or *Definitely No* to both. Then complete column (v) and indicate that the problem with intensive care was *Underuse*. Leave column (v) unchecked for telemetry without intensive care because this service was not underused.

**Respiratory therapy delivered**: Respiratory therapy delivered refers to the therapy received by the patient and is based on physicians' orders and the delivery of therapy by the respiratory therapist or nurse. For respiratory therapy, include the use of intermittent positive pressure breathing (IPPB); hand-held nebulizer (HHN); ultrasonic or aerosol therapy; incentive spirometer (IS); or postural drainage and percussion (PD&P).

**O₂ and Ventilation**: Ventilation refers to intubation with mechanical ventilation. O₂ refers to oxygen therapy by mask, nasal cannula, or prongs.
physical therapy delivered: Base your assessment on both the physicians' orders and the delivery of therapy by the physical therapist or nurse.
QUESTION 6: Assessing the Adequacy of the Length of the Hospital Stay.

PURPOSE
The purpose of this question is to assess the adequacy of the length of the hospital stay.

DATA SOURCES
Use all relevant information in the medical record to address this question.

RATING SCALE

*Definitely Yes:* A rating of Definitely Yes means that the patient was discharged at the right time considering the benefits and risks of hospitalization. The patient did not stay in the hospital too long given his/her status in the days prior to discharge and the disposition plans for the patient. In addition, the patient was not discharged too soon. This rating means that the patient definitely benefited more than suffered as a result of the length of stay.

*Probably Yes:* A rating of Probably Yes means that the patient probably benefited more than suffered as a result of the length of stay.

*Probably No:* A rating of Probably No means that the patient probably suffered more than benefited as a result of the length of stay.

*Definitely No:* A rating of Definitely No means that the patient definitely suffered more than benefited as a result of the length of stay.
Too Short: A rating of Too Short means that the patient had a significant chance of adverse health consequences that might have been avoided had the patient remained in the hospital longer.

Too Long: A rating of Too Long means that the patient remained in the hospital beyond the point of maximal benefit.

Note
If the patient was transferred to another acute care hospital for further care, assign a rating of Probably Yes.

SPECIFIC ITEMS
Item 6b
Apparent reasons for too short length of stay

- Patient too unstable for level of care to which he/she is being discharged
- Work-up incomplete and unlikely to be completed after discharge
- Rehabilitation incomplete and unlikely to be completed after discharge
- Patient or family insisted on discharge

Apparent reasons for too long length of stay

- Awaiting bed at nursing home or extended care facility
- Awaiting preparation of home care support services
- Patient or family refused discharge
- Awaiting specific diagnostic or therapeutic procedure

If none of the listed reasons for inappropriate length of stay apply, write the actual reason in the margin of the form.
QUESTION 7: Assessing the patient's functioning at discharge.

PURPOSE
The purpose of this question is to assess the patient's degree of disability at discharge. Disability means any limitation in the patient's ability to carry out daily activities, such as self-care, household tasks, social activities, or work.

DATA SOURCES
Physician notes; physical, occupational or speech therapy notes; nursing notes.

RATING SCALE
Not Disabled: A rating of Not Disabled means that the patient can carry out all daily activities without difficulty.

Somewhat Disabled: A rating of Somewhat Disabled means that the patient has difficulty carrying out some activities of daily living.

Very Disabled But Not Bedridden: A rating of Very Disabled means that the patient has much difficulty carrying out basic daily activities such as self-care.

Bedridden: Bedridden means that the patient is likely to spend more than 50% of his/her time in bed.
QUESTION 8: Assessing the Preventability of the Patient's Death

PURPOSE

The purpose of this question is to assess whether the patient's death was preventable. Assume that the patient's outcome (what happens to him/her) depends upon three factors:

(a) the patient's degree of sickness at admission
(b) the treatability of the patient's condition by medical science (given the best of circumstances)
(c) the processes of care delivered to the patient during the hospital stay.

In the event that an egregious error leading to death was made in the delivery of care to this patient, then this may be an easy question to answer. However, also consider the situation where a series of smaller errors of omission or commission produced poor care. This too could represent a preventable death if the patient was viable enough to have survived with better care. In answering this question avoid the bias that all deaths are preventable given medical science in the 1980s. This just is not so.

DATA SOURCES

Use all relevant information in the medical record to address this question.

RATING SCALE

Definitely Preventable: Definitely Preventable means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have survived if adequate care had been given.
Probably Preventable: Probably Preventable means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have survived only if optimal care had been given.

Probably Not Preventable: Probably Not Preventable means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have died if adequate care had been given.

Definitely Not Preventable: Definitely Not Preventable means that the patient's level of sickness and the treatability of the condition were such that the patient was likely to have died despite optimal care.
QUESTION 9: *Assessing the Patient's Outcome at Discharge.*

PURPOSE

This question focuses on outcomes at discharge given the level of sickness at the time of admission and the treatability of the condition. In rating this question ignore the processes of care that were actually delivered. Base your rating on the most likely outcome for the patient in relation to the patient's actual outcome, given the level of sickness at the time of admission and the treatability of the condition.

DATA SOURCE

Use all relevant information in the medical record to address this question.
QUESTIONS 10-11: Overall Assessment.

PURPOSE
The purpose of Questions 10-11 is for you to specify your overall assessment about the care delivered to this patient.

DATA SOURCES
Use all relevant information in the medical record to address questions 10-11.

QUESTION 10: Rate Overall Quality of Care
This question addresses the overall care delivered to the patient, considering processes and outcomes.

QUESTION 11: Would You Send Your Mother?
This question is designed to integrate your thought and judgment with your feelings and intuition.
BIBLIOGRAPHY


