

A False Claim by the OIG: Alleged Upcoding of DRG 416

A Clinical Analysis of Septicemia

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Introduction

In its report entitled *Medicare Payments for Septicemia* (OEI-03-98-00370, March 1999),

<http://www.dhhs.gov/progorg/oei/reports/a356.pdf>, the Office of Inspector General ("OIG") suggests that hospitals may be improperly upcoding urinary tract infections (DRG 320) to septicemia (DRG 416). However, the OIG's premise in the report for differentiating the two DRG codes conflicts with the authoritative coding guidance on the subject. A clinical analysis of septicemia exposes the OIG's false claim of possible widespread upcoding to DRG 416.

What Is Septicemia?

Septicemia, commonly known as an infection involving the bloodstream, is a very serious syndrome that recently replaced homicide as the 12th leading cause of death of the overall population in the United States. Septicemia can result from bacteria infecting the bloodstream in various ways. It is more common among the Medicare population (65 years and over) because of the overall decline of immune system function as a progression of the normal aging process. Septicemia has a higher fatality rate per hospital discharge than each of heart disease, malignant neoplasms (cancer), pneumonia and cerebrovascular disease (stroke).

Septicemia in the Medicare population often occurs as a result of a urinary tract infection that has extended into the bloodstream. In some instances, these patients are treated initially with antibiotics on

an outpatient basis. Occasionally, the empirically chosen antibiotics will not cover the specific infection in the urinary tract and inpatient admission can result from such treatment failures. When antibiotics are ineffective and time has elapsed, the infection may spread into the systemic circulation.

Blood cultures can be affected by prior outpatient antibiotic treatment and are not reliable in confirming or excluding the diagnosis of septicemia. Physicians will usually look at the comprehensive clinical picture in arriving at such a diagnosis. These patients may exhibit a lowered blood pressure, a reflexly elevated heart rate, decreased or elevated temperature, as well as confusion, oliguria, metabolic acidosis, and other manifestations of impaired end-organ perfusion.

Distinguishing Septicemia (DRG 416) from Urinary Tract Infection (DRG 320)

Clinicians routinely refer to the above set of circumstances as urosepsis, a widely accepted description of the patient with urinary tract infection that has progressed into generalized sepsis or septicemia. The problem for Medicare billing purposes is determining at what point does a simple urinary tract infection (DRG 320) progress into generalized septicemia (DRG 416). The hospital receives approximately \$2,000 more per discharge for the primary diagnosis of septicemia (DRG 416) rather than urinary tract infection (DRG 320).

According to the OIG's report on *Medicare Payments for Septicemia*, "diagnostic testing through a urine analysis or culture should differentiate the two codes" (DRG 320 vs. DRG 416). This statement in the OIG's report is clinically incorrect and is directly contradicted by the authoritative coding guidance on the subject.

Authoritative Coding Guidance

Healthcare providers in the United States describe various diseases, procedures, complications and comorbidities using the approximately 10,000 numerical codes which comprise the International Classification of Diseases, Ninth Revision, Clinical Modification ("ICD-9-CM"). ICD-9-CM is based on the international classification system developed by the World Health Organization, a specialized agency of the United Nations based in Geneva, Switzerland. However, application of ICD-9-CM in the United States is governed by *Coding Clinic for ICD-9-CM*, a quarterly newsletter published by the American Hospital Association's Central Office on ICD-9-CM and produced in cooperation with the American Hospital Association, American Health Information Management Association, National Center of Health Statistics and the Health Care Financing Administration ("HCFA"). The *Coding Clinic* is the final authority for coding and reporting guidelines under Medicare.

Cultures Are Not Required For Diagnosis of Septicemia

The *Coding Clinic* for the first quarter of 1988 specifically addressed the problem of coding for septicemia:

The combination of general sepsis (septicemia) and shock resulting from injured and infected tissue was recognized as a clinical condition before germ theory of disease was well understood. Although a great deal is now known about the basic pathophysiology of the condition, the diagnosis is still based largely on the history and physical findings of the patient (clinical evidence). . . . Although blood is often drawn for culturing during the initial work-up, treatment (including antibiotics) must be started quickly and before the results of the culture are known. Although a patient may show clinical evidence of septicemia, the blood culture may be negative due to difficulty in culturing fastidious organisms from blood, growth inhibitory factors in the blood, or initiation of specific antibiotic therapy before laboratory test samples are taken. Negative or inconclusive blood cultures do not preclude a diagnosis of septicemia in patients with clinical evidence of the condition.

(Emphasis in the original).

Confusion Over Urosepsis

The same *Coding Clinic* also addressed the clinical and billing confusion over the term "urosepsis":

The unusual or imprecise diagnostic reference to a site or organ-specific sepsis, such as urosepsis, may require further clarification for coding purposes. Although the Alphabetic Index [of ICD-9-CM] assigns urosepsis to urinary tract infection, 599.0, this classification may or may not be what the physician intended. The physician should be asked if the diagnosis of urosepsis is intended to mean (1) generalized sepsis (septicemia) caused by leakage of urine or toxic urine by-products into the general vascular circulation, or (2) urine contaminated by bacteria, bacterial by-products, or other toxic material but without other findings, 599.0.

Clinical Documentation Required For DRG 416

The *Coding Clinic* for the third quarter of 1988 further explained the clinical picture that must be present and documented to justify the use of the ICD-9-CM code assignments of 038.0-038.9, septicemia, that are grouped to DRG 416 for Medicare billing:

Frequently, the patient is suspected of having septicemia and is treated for such even though blood cultures may not be supportive. Septicemia or bacteremia (classifiable to codes 038.0-038.9) may be defined as evidence of infection with fever or hypothermia, tachypnea, tachycardia, and impaired organ system perfusion, such as altered mental status, oliguria, and relative hypotension. Metabolic acidosis may also be present secondary to impaired organ perfusion, as evidenced by either an increased lactate level, increased anion gap, or reduced blood pH. Further documentation of suspected septicemia or bacteremia usually includes treatment with intravenous broad-spectrum antibiotics, fluid hydration, and possibly the use of medications to raise the blood pressure.

The Public Health Service and HCFA have published Official ICD-9-CM Guidelines for Coding and Reporting, which are accessible on the Web at <http://www.cdc.gov/nchswww/data/icdguide.pdf>. These guidelines previously appeared in the *Coding Clinic* published by the American Hospital Association. Section 7 of these guidelines repeats the basic coding principle for septicemia: "Negative or inconclusive blood cultures do not preclude a diagnosis of septicemia in patients with clinical evidence of the condition."

False Claims vs. Clinical Picture

The OIG's report on septicemia erroneously states that diagnostic testing differentiates DRG 320 from DRG 416, when in fact the overall clinical picture determines the issue. If a provider made a similar mistake, it may be subjected to civil sanctions under the False Claims Act and Social Security Act because the error would appear to be made either in deliberate ignorance or reckless disregard of the truth or falsity of the information, given the direct authority on the issue. Civil sanctions against the provider can be severe, including triple damages plus up to \$10,000 per claim and possible exclusion from participation in federal healthcare programs. These laws set unreasonable standards for technical documentation and coding issues that even the OIG cannot satisfy. More importantly, the clinical picture and quality of care are being ignored in the witch-hunt for upcoding.

OIG's Selection Methodology

In its study entitled *Using Software to Detect Upcoding of Hospital Bills* (OEI-01-97-00010, August 1998), <http://www.dhhs.gov/progorg/oei/reports/a284.pdf>, the OIG appropriately recognized the limitations of software in detecting so-called "upcoding" of hospital bills. The study found that only 10 to 20 percent of cases that the software identified as upcoded were, in fact, upcoded. The software also identified as high upcoders a substantial number of hospitals in which the OIG's own medical record review identified few or no upcoded cases. The true upcoding error rate can only be determined by undertaking a detailed review of the clinical documentation at each hospital.

Nevertheless, the OIG report on septicemia selected hospitals for potential upcoding based on two non-clinical criteria:

- >3% of discharges coded to DRG 416, and
- proportion of DRG 416 discharges to total discharges increased more than 100% from 1993 to 1996.

For the 120 hospitals (out of 4,701) that met the selection criteria, DRG 416 discharges increased on average 43% per year from 1993-96 as compared to a national average increase of 9% per year. However, the OIG does not assume upcoding based solely on the disproportionately increasing cases of septicemia in these selected hospitals. The OIG's report specifically recognizes that true upcoding error rate can only be determined by undertaking a detailed claims review at each hospital. In the case of septicemia, there are many reasons why a hospital may experience a disproportionate increase in cases that are unrelated to upcoding. A primary reason may be the hospital's individual demographics because septicemia is a syndrome that disproportionately affects the elderly.

Septicemia Is Increasing

Recent statistics suggest that factors other than age are contributing to the increased incidence of septicemia. From 1979 (when ICD-9-CM was first implemented in the United States) to 1996, the age-adjusted death rate for septicemia increased by an alarming 78.3% according to the Centers for Disease Control and Prevention. In contrast, age-adjusted death rates for heart diseases, cerebrovascular diseases (strokes) and accidents each declined roughly 30% and malignant neoplasms (cancer) declined 2%. Physicians cannot yet explain the causes for the increase in septicemia, but several hypotheses can be advanced.

- Fewer heart attacks, strokes and accidents are leaving septicemia as an unmasked illness and cause of death. Coding conventions force physicians to specify a primary diagnosis even though multiple factors are present in many cases. A related factor may be earlier and more aggressive surgical interventions to prevent heart attacks and strokes create more risk for septicemia.
- Long-term overuse of antibiotics has increased the number of antibiotic-resistant bacteria capable of infecting the blood.
- Modern pollutants and broader use of agents that have immunosuppressant characteristics (such as cortisone and other steroids) have damaged human immune systems, leaving them more vulnerable to infectious diseases such as septicemia, pneumonia and chronic obstructive pulmonary diseases.

Fear Factor

Despite the documented increase in the frequency of septicemia on a national level and the authoritative coding guidance, physicians are often reluctant to propose the diagnosis of sepsis without a supporting blood culture. Physicians still manage and treat these same patients in an aggressive manner consistent with the seriousness of their condition. The direct loser is the hospital, deprived of more than \$2,000 per discharge while it must provide full resources to the acutely ill patient suffering from the clinical symptoms of septicemia. The indirect loser is the physician, who will appear to be an incompetent and inefficient provider when managed care payors and credentialing committees review his high mortality rate and abnormally long lengths of stay for urinary tract infections (DRG 320), which really are downcoded cases of septicemia.

The OIG should prosecute providers who intentionally attribute the diagnosis of septicemia to the patient who does not manifest the clinical evidence of such a serious condition. However, the OIG, HCFA, fiscal intermediaries and providers should focus on the clinical documentation and terminology to support correct coding that, in turn, reflects appropriate severity of illnesses within the Medicare population. DRG 416 and other DRGs targeted by the OIG involve coding guidelines that may require clinical clarifications. Using software tools or superficial profiling that lack a clinical documentation component will not produce an accurate picture of either upcoding or downcoding.

Conclusion

Contrary to the OIG's report, negative or inconclusive blood cultures do not preclude a diagnosis of septicemia and coding to DRG 416 for patients with clinical evidence of the condition. The true error rates for upcoding and downcoding can only be determined by undertaking a detailed review of the clinical documentation at each hospital. Septicemia is a serious syndrome that is significantly increasing in the United States. Providers must carefully develop and document the clinical picture surrounding septicemia in order to improve the quality of care and to justify billings under DRG 416.

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