CMS ICD-10 Planning
Initial Summary of AHIMA Executive Report

Project Scope

CMS recently concluded a one year project with the American Health Information Management Association (AHIMA) to identify and assess the business processes, systems and operations under CMS’ direct responsibility that would potentially be impacted by a transition to the ICD-10 code set. The AHIMA project was the first of several efforts that will be undertaken to prepare CMS for the transition to ICD-10. The second phase of planning has been initiated and is expected to build on AHIMA’s findings and move CMS closer to an implementation plan within the coming year.

The attached document is a high-level and very preliminary summary of a more extensive AHIMA report chronicling CMS business processes that would be impacted by an ICD-10 transition. The information in the summary, including the risk and impact assessments, should be looked at as an initial review subject to change as we complete additional analysis. Although both the project and report were intended to be solely CMS-focused, the agency is committed to sharing, as expeditiously as possible, the entire report (subject to internal clearance) to provide relevant insights for ICD-10 planning and implementation activities. CMS will continue to refine these findings, and as planning efforts continue, will share additional information as it becomes available.

While the primary objective of this analysis was to assess the potential impact of ICD-10 adoption upon the systems, policies, processes and operations under CMS’ direct control, we realize that this new requirement will have wide-ranging impacts upon the States, providers and beneficiaries.

Methodology

The project team undertook a systematic review of CMS business processes, reviewed online documentation, and conducted interviews with agency components. CMS components participated in 50 overview interviews to identify the areas potentially impacted by the implementation of ICD-10.

From those overview interviews, 26 CMS areas and 19 business processes were identified that would potentially be impacted by ICD-10. CMS components in these areas participated in follow-up detailed interviews and communications. Each respective CMS component reviewed the interview summaries, and their feedback was incorporated into the report findings.
Ranking Levels

The potential effects of CMS' ICD-10 implementation have been assessed based on the generally-accepted categories of impact, risk and cost. High, Medium, Modest or Minor rankings were developed based on these categories. A high ranking in any of these three areas constituted a high overall impact to that process:

- The **impact rank** relates to ICD-10 operational considerations
- The **risk rank** relates to needed modifications to processes as a result of the transition to ICD-10
- The **cost rank** relates to resources required for the transition to ICD-10: High (over $10,000,000), Medium ($1,000,000 to $10,000,000), Modest ($100,000 to $1,000,000), or Minor (Under $100,000)

Initial Findings Overview

High Impacts

The CMS areas that were identified as having the potential to be highly impacted by the transition to ICD-10 include:

- Claims Processing (Parts A, B and DME)
- CMS System Repositories
- Develop and Implement Payment Policy
- Quality Measures and Payment Initiatives
- Develop and Utilize Assessment Tools
- Risk Adjustment
- Quality Improvement Activities

Claims Processing

Part A/B uses the Fiscal Intermediary Standard System (FISS), which is the shared system used by fee-for-service (FFS) claims contractors, also known as Fiscal Intermediaries (FIs) or Medicare Administrative Contractors (MACs), to process institutional claims that are covered under Parts A and B. FISS performs consistency and administrative editing including ICD field values submitted on the claim.

The Multi-Carrier System (MCS) is the shared system used by FFS claims contractors, Carriers and MACs, to process non-institutional Medicare Part B claims for both physicians and non-physician practitioners.
The ViPS Medicare Shared System (VMS) processes claims for Durable Medical Equipment, Prosthetics, Orthotics, & Supplies (DMEPOS), and other services/supplies not included for payment in other Medicare Part A or B provider services. VMS also includes much of the Part B functionality for claims adjudication, collections, etc. as well as Certificate of Medical Necessity (CMN) requirements and supplier interfaces.

The Common Working File (CWF) contains information about all Medicare beneficiaries and as such, is used in all claims processing. CWF interfaces directly with FISS, MCS and VMS, to combine Part A, B and D beneficiary data to verify beneficiaries' entitlement to Medicare, deductible status, and benefits available, such as lifetime reserve days, as well as approve payment.

Findings:

Key impact areas revolve around the different transactions that contain ICD codes and the associated character and field length, as well as updates to algorithms. The accuracy of the instructional specification changes which contain ICD codes are of high impact and critical to provider billing for beneficiary services and shared system updates which are used by the FIs/Carriers/MACs for claims processing. Additionally, these systems will need to accommodate dual processing of claims utilizing both ICD diagnosis code sets based on the date of service (DOS); as well as an update to the ICD diagnosis code file and duplicate Local Coverage Determination (LCD) file edit changes to include ICD-10 codes based on date of service (DOS).

CMS System Repositories

CMS System Repositories and their Data Outputs Process include management, provision and storage of CMS claims data submitted FIs, Carriers, States and MACs. These data are stored and used for payment, payment policy, demonstrations, program integrity, clinical and related research projects (internal and external) and analysis for current and future reimbursement methods; virtually by all areas of CMS as well as external contractors, researchers, providers and the general public.

Among some of the repositories, the CWF, National Claims History (NCH) file, National Medicare Utilization Database (NMUD), Medicaid Statistical Information System (MSIS) and the Integrated Data Repository (IDR) supply data to a host of other systems across the agency.

Findings:

The impacts are considered high to CMS for all systems, files and data repositories storing ICD coded data. Updates are required for each system including algorithms, character and field length modifications. Mapping of ICD-9-
CM codes to ICD-10-CM and ICD-10-PCS coded data will be needed to accommodate trending of diagnosis/procedure information and research impacting numerous CMS activities.

Develop and Implement Payment Policy

CMS refines Medicare payment policy and responds to changes in clinical practice and industry operations through annual rulemaking.

This process involves business owners that write FFS payment policies and regulations; create billing instructions to FFS providers, suppliers and FIs/MACs; provide education to FFS providers, suppliers and FIs/MACs; respond to provider and supplier telephone and written inquiries; and implement claims processing instructions and shared systems software specification changes.

Findings:

ICD-10 will likely have a high impact on this process because of the varying levels and detail of ICD code use within each of the payment policies, and interdependencies associated with other programs within CMS, which make the update process lengthy and complex.

Quality Measures and Payment Initiatives

The Develop and Support Quality Measures and Payment Initiatives process involves the development of quality measures for use in such initiatives as Physicians’ Quality Reporting Initiative (PQRI), Reporting Hospital Quality Data for Annual Payment Update (RHQDAPU), and Hospital Outpatient Quality Data Reporting (HOP QDRP). As ICD-9 codes are used in the development of quality measures, they are an integral element of measure specifications and algorithms.

The three payment initiatives highlighted provide incentive payments for data submission.
- The PQRI program makes incentive payments to physicians and other providers in outpatient settings
- The RHQDAPU program makes incentive payments to inpatient hospitals,
- The HOP QDRP makes incentive payment to outpatient hospitals.

Findings:

The ICD-10 transition will have a high impact on these processes, namely updating the measures specifications and algorithms with ICD-10 codes. Although mapping between ICD-9 and ICD-10 exists, algorithms may be compromised as there is not necessarily a one to one correlation in all cases. Additionally, the various databases and warehouses that receive, store and
analyze the expanded ICD-10 codes throughout the process will need to be updated.

**Develop and Utilize Assessment Tools**

The Develop and Utilize Assessment Tools process highlights the development, collection, and reporting of assessment instruments data for skilled nursing facilities, home health agencies, swing bed hospitals, and inpatient rehabilitation facilities. CMS is responsible for the development of the software packages that providers can use to collect and report their assessment data, analysis of the data submitted and management and reporting of the data received.

There are three main uses for assessment data as collected by CMS:
1. in the claims process to identify how grouper codes and Health Insurance Prospective Payment System (HIPPS) codes are assigned for each of the four provider types, which impacts payment and eventually future payment policies
2. to report quality of care on CMS’ various compare websites for specific providers
3. by State survey agencies to survey and certify home health agencies and skilled nursing facilities

Findings:

The primary **high** impacts of the ICD-10 implementation on these processes are the revisions to the assessment instruments and the reformatting and reprogramming of the various systems that collect, store, and report assessment instrument data. These systems will also require algorithm changes and the capacity to incorporate new grouper and pricer specifications.

**Risk Adjustment**

Medicare risk adjustment ensures that payments for services provided through Part C (managed care), and Part D, (drugs) are keeping pace with health care costs while adhering to CMS standards for quality care. CMS conducts risk adjustment using data captured through claims to group patients into risk adjustment categories, assign payments based on a member’s medical condition group, and create “risk scores” which are then used to calculate payments and standardize plan bids for comparison.

The Risk Adjustment Process involves a number of system applications and databases, many of which use and store ICD-9 codes. Clinical encounter data from managed care plans (Plans) is assessed for validity, accuracy and beneficiary eligibility before it is run through risk models resulting in Hierarchical
Condition Categories (HCCs) which are weighted and used to calculate risk scores for each beneficiary as well as an aggregate score for each Plan.

Risk Scores, on which plan payments are determined, are calculated using a range of clinical information including ICD-9 codes, obtained from data extracts from the Common Medicare Environment (CME), Medicare Beneficiary Database (MBD), NMUD, the Medicare Advantage Prescription Drug System (MARx) and Plan contract data from the Health Plan Management System (HPMS). Risk adjustment systems also support reporting internal to CMS as well as directly to the Plans and the general public.

Findings:

Overall, a transition to ICD-10 will have a high impact to the systems involved in the Risk Adjustment Process. Each system and interface must be evaluated to determine readiness to support a transition to ICD-10. CMS and Medicare support contractors will need to target areas such as field character length in databases, formulas, calculations, reports and application user displays. Policies will also need to be updated. Further, impact was identified for the Risk Adjustment Data Validation (RADV) Process involving three contractors, systems and training needs.

Support Quality Improvement Activities

The Quality Improvement Organizations (QIOs) program consists of private, mostly not-for-profit organizations staffed by physicians, nurses and other healthcare professionals. CMS contracts with one organization in each state and/or territory/jurisdiction to serve as its QIO.

The core functions of the QIO program are:

- Improving quality of care for beneficiaries
- Ensuring that Medicare pays only for services that are reasonable, necessary, and provided in the most appropriate setting
- Protecting beneficiaries by expeditiously addressing individual complaints and provider-based notice appeals

CMS awards three-year QIO contracts, called Statements of Work (SOW). The current QIO SOW has six main themes or processes:

- Beneficiary protection (national)
- Patient safety (national)
- Core Prevention (national)
- Care Transitions (sub-national)
- Prevention Disparities (sub-national)
- Prevention: Chronic Kidney Disease (sub-national)
Findings:

A primary high impact resulting from ICD-10 will be on the systems used to supply data to the QIOs. CMS will be responsible for updating the following systems to accommodate ICD-10 codes: Administrative Warehouse, Health Account Joint Information (HAJI) Part A and Part B, Case Review Information System (CRIS), and the Care Transitions Database.

Additionally, CMS will be responsible for rewriting the algorithms used to calculate the prevention measures and some of the patient safety measures. The analytic files associated with its Care Transitional Database will also need to be rewritten to accommodate ICD-10 codes.

Key Impact Findings – HIGH

- Existing contracts spanning implementation deadlines may need to be aligned or adjusted to coordinate and streamline the incorporation of ICD-10 into interdependent CMS policies, processes and associated systems

- The transition from ICD-9 to ICD-10 is most significantly a software update. The logic changes required with the implementation of ICD-10 will require complex algorithms to be revised. This work is in addition to the work contractors will need to perform when modifying field sizes in preparation for Version 5010 implementation prior to ICD-10 implementation.

- Electronic software to map ICD-9 codes to ICD-10 codes both forward and backward would increase the productivity of contractors and internal resources working to meet the implementation deadlines.

Medium Impacts

The following areas were identified as having the potential to be impacted by the transition to ICD-10 with a medium ranking:

- Appeals
- Coordination of Benefits
- Medicare Integrity
- Medicare Secondary Payer

Appeals

CMS contracts with external entities to perform Medicare appeals processing functions, which include, but are not limited to, claims processing and appeal reviews. FIs, Carriers, or MACs perform processing services for Parts A & B. Medicare Advantage (MA) Plans are responsible for Part C, and Medicare
Prescription Drug Plans (PDP) are responsible for Part D. ICD-9 codes reside in each step of the appeals process. CMS directly oversees the first two levels of the process, however up to 3 additional levels of appeal are outside of the CMS jurisdiction. A CMS-developed Medicare Appeals System (MAS) is utilized at multiple levels throughout the process.

CMS uses the MAS to collect and maintain information necessary to track the level 2 and level 3 appeal requests. Information recorded in the MAS includes appeal status, case type, case history, timely resolution tracking, decision letters, and all other correspondence related to a case. Currently, MAS users at the Qualified Independent Contractors (QIC) and Administrative Law Judges (ALJs) at Office of Medicare Hearings and Appeals (OMHA) enter ICD-9 codes into the MAS.

Findings:

The impact on appeals is **medium** and mainly to the MAS' database structure, screens, and reports. CMS must ensure continued reporting capabilities for periods of time where appeal information containing ICD-9 and ICD-10 codes may overlap or contain only historical ICD-9 codes. System crosswalks and tables are possible solutions. A new MAS interface and existing database will be able to accommodate the extended character length and alpha characters required by ICD-10.

**Coordination of Benefits Agreement**

The Coordination of Benefits Agreement (COBA) process allows supplemental insurers to send eligibility information to CMS, which then provides those insurers Medicare paid claims data for processing supplemental insurance benefits. The Coordination of Benefits Contractor (COBC) manages this national program for CMS.

The COBC collects beneficiary eligibility information from supplemental payers and periodically sends this eligibility information to the CWF. COB flat files with claims that contain ICD codes for beneficiaries with other insurance are sent from the CMS claims processing systems to the COBC for review and evaluation, and forwards them to supplemental payers.

Findings:

The primary impacts on COBA process is **medium** and will mainly be on the crossover portion where claims are sent from CMS claims processing systems to the COBC. The COBC translates and validates the claims before sending them to supplemental payers, who translate and validate the claims into a HIPAA compliant format before transmitting the claims to COBA trading partners. Although coordination of benefits mainly focuses on beneficiary eligibility, the
claims data used throughout this process contains ICD codes that are preserved and processed through systems associated with this process.

**Medicare Integrity Operations**

Medicare Integrity involves six different operational fraud, waste and abuse programs within CMS; four targeting Medicare, one targeting the overlap between Medicare and Medicaid and one targeting Medicaid. They are:

1. Medical Review, which involves analysis of claims data for aberrances, pre-payment reviews triggered by system edits, and post payment reviews, all of which involve claims data and therefore ICD codes.
2. The Program Safeguard Contractors (PSCs), which investigates Medicare fraud, waste and abuse within Medicare Parts A and B. Investigations are based on FFS claims data obtained from CMS claims processing systems and thus involve ICD codes.
3. The Comprehensive Error Rate Testing Process (CERT) estimates payment error rates and monitors the accuracy of Medicare fee-for-service payments within Medicare Parts A and B.
4. The Medicare Drug Integrity Contractors (MEDICS), which investigates fraud waste and abuse in the Medicare Part D program. Although Part D claims data does not routinely contain ICD codes, the program also may utilize some Parts A and B claims data which do.
5. The Medi-Medi program investigates fraud, waste and abuse of services and payments rendered on behalf of Medicare and Medicaid dual eligible beneficiaries. Both Medicare and Medicaid claims data are utilized, which contain ICD codes.
6. Payment Error Rate Measurement (PERM) measures improper payments in the Medicaid program and State’s Children Health Insurance Program (SCHIP). The PERM process estimates payment error rates for the fee-for-service and managed care components of both the Medicaid program and the SCHIP program.

**Findings:**

All integrity programs will require some level of structural and logic updates to associated systems, algorithms, and reports. Additionally, a crosswalk mapping between the two coding systems would be needed. The contractors will need in-depth ICD-10 education and training to accurately review claims and medical records after the transition to ICD-10. Analyses that require trending over time will need to accommodate processing of both ICD-9 and ICD-10 data, in which case, mapping between the two coding systems will be required.

**Medicare Secondary Payer**

The Medicare Secondary Payer (MSP) process identifies Medicare beneficiaries with primary insurance coverage carrying Medicare as a secondary payer. The
Coordination of Benefits Contractor (COBC) collaborates with CMS to collect information on beneficiaries with Group Health Plans (GHP) and Non-Group Health Plans (Non-GHP) as primary payers. GHP involves beneficiaries with employment or other insurance plans covering medical care. Non-GHP involves beneficiaries with liability insurance including Worker’s Compensation (WC) and Automobile Accident/Liability Insurance as the primary insurer for specific injuries or conditions. The process identifies beneficiary claims which CMS may have erroneously paid as the primary insurer, and attempts to recover funds mistakenly paid, or paid conditionally, by CMS. The MSP process can be a pre- or post payment activity.

Findings:

The primary medium impacts for the MSP process are system changes required to accommodate ICD-10. As a downstream process to claims processing, MSP utilizes claims data from CMS claims processing systems and repositories. System modifications will require structural as well as algorithmic updates. Any decrease in CMS’ ability to collect, store and use claims information may prevent or delay the identification of conditional payments by CMS.

Key Impact Findings – MEDIUM

- All the impacted areas should be included in the corporate implementation plan to minimize duplication of effort and costs.
- CMS should first focus on the implementation efforts and planning activities, then evaluate the need, interest and feasibility of converting historical data to ICD-10.
- Comparison between ICD-9 and ICD-10 is paramount for logic and algorithmic changes to be made in operational systems, especially those needed to support post adjudication processes, but also for historical comparisons, trending and other programmatic analyses.

Modest Impacts

The following areas were identified as having the potential to be modestly impacted by the transition to ICD-10.

- Research
- Demonstrations
- Evaluations
- Medicaid Integrity
- Medicaid Policy and Operations
- Provider Cost Reporting
We acknowledge that this new requirement will have a wide-ranging impact on State Medicaid programs, but note that analysis of State Medicaid requirements was outside of the scope of this contract.

Research

The Conduct Research Process includes both the collection and dissemination of Medicare and Medicaid data for research projects and for inclusion in publications. This process provides detailed information on how the transition to ICD-10 codes will impact the Chronic Condition Data Warehouse (CCW), the Medicare and Medicaid Statistical Supplement, and all associated systems. The CCW is a data warehouse providing researchers access to CMS data on chronically ill Medicare beneficiaries, and the Medicare and Medicaid Statistical Supplement is an annual publication on health care finance information. The data sources for the CCW include National Claims History (NCH) for FFS claim data, Quality Improvement Evaluation System (QIES) for assessment data and Enrollment Database (EDB) for beneficiary data.

Findings:

The primary modest impacts for the ICD-10 transition for CCW relate to the ICD data included in claims, enrollment, and assessment data, and the linkage by beneficiary data across years and files. In addition, complex algorithms are utilized that will require updating to accommodate the specificity and complexity of the ICD-10 coding classification system. The primary modest impact to the process of Collect and Publish Medicare and Medicaid Statistical Supplement is trending of data over multiple years during the transition where translation and comparison of ICD-9 and ICD-10 will be required.

Demonstrations

CMS conducts and sponsors a number of demonstration projects to test and measure the effect of potential policy and program changes. The demonstrations study the likely impact of new methods of service delivery, coverage of new types of service, and new payment approaches on beneficiaries, providers, health plans, states, and the Medicare Trust Funds.

Systems utilized for the planning of demonstrations and collection of demonstration data include, but are not limited to, the NCH, NMUD Standard Analytic File (SAF) and MSIS or Medicaid Analytic eXtract (MAX). These systems contain ICD coded data.

Findings:
The primary modest impacts for the ICD-10 transition are on the demonstrations spanning the transition from ICD-9 to ICD-10 codes. These demonstrations may need to collect data containing both ICD-9 and ICD-10 codes and thus may require updates or modifications to CMS systems to allow for the use of both code sets.

Evaluations

CMS conducts studies and performs evaluations focused on Medicare Parts A, B, C and D, Medicaid and special populations for use by both the agency and Congress to facilitate further studies, research and refinements in provider payment systems. Research is conducted on a retrospective basis usually utilizing three years of data. Much of CMS’ research and analytical information is based on ICD-9 codes and MS-DRG (Medicare Severity – Diagnostic Related Groups) data. MS-DRGs are created within the CMS claim payment systems and utilize specific ICD-9 diagnosis and procedure codes.

Findings:

The primary modest impacts for the ICD-10 transition are on the evaluations spanning the transition from ICD-9 to ICD-10 coding standards and may require updates or modifications to CMS systems to allow for the use of ICD-10 codes.

Medicaid Integrity Operations

The Medicaid Integrity Program was established through the Deficit Reduction Act of 2005. This process has two main functions: to effectively provide support and assistance to the states with their Medicaid fraud programs and to conduct Medicaid integrity audits. Federal oversight of state run integrity operations ensure compliance with Federal laws and regulations, identify best practices, and provide training and technical assistance in key fraud and abuse areas of interest to the States.

The States submit five types of claims data including inpatient, physician, drug, long term care and eligibility files from their Medicaid Management Information System (MMIS) to CMS on a quarterly basis; these include ICD codes. CMS mines these data to identify emerging trends in Medicaid fraud and abuse and to identify providers who may be billing Medicaid inappropriately.

Findings:

The primary modest impacts will be around the reprogramming of the algorithms and field size and length for the various data bases and systems used in this process as well as ensuring that the data exchanged has been properly mapped between ICD-9 and ICD-10 codes. However, during the transition, if state systems are updated at different times, CMS could receive ICD-9 data from
some states and ICD-10 data from others. CMS systems have been developed to accommodate ICD-10 codes, but consideration must be given to how to accommodate receipt of data containing both ICD-9 and ICD-10 codes simultaneously.

Medicaid Policy and Operations

The Develop Medicaid Policy process identifies the drivers for the creation of Medicaid policy. Drivers include Congressional mandates, CMS and state initiatives. Medicaid policy includes programs to provide State Program Waivers, such as the Family Planning Services waivers and the Oregon 1115 waiver; both containing ICD codes. Medicaid is also responsible for recovering payments made prior to payer confirmation and does so through a process called “pay and chase,” which utilizes ICD codes to outline the requirement for state payment of claims for certain identified high risk and vulnerable populations.

State Medicaid offices are required to maintain and update their MMIS. CMS maintains a fund to support and certify state MMISs, and outlines the process of states requesting such funding and certification. States submit Medicaid claims on a quarterly basis from their MMIS to CMS for review, oversight and analysis.

Findings:

Of the numerous Medicaid policy processes, the mandated Pay and Chase policy, the Family Planning Services, and State Program Waiver policies will be modestly impacted by ICD-10. In addition, the MMIS Certification and Funding policy process will see a modest impact due to the need to update the policy with a sample of pertinent ICD-10 codes; a temporary increase in workload to process the increased amount of funding and administrative cost requests from the states; the updating of CMS systems; and the upgrading and recertification of all state MMIS systems.

Provider Cost Reporting

Medicare-certified institutional providers are required to submit an annual cost report to their FI or MAC detailing the systems involved and activities performed by CMS, FIs/MACs and providers. These institutional providers then submit an annual cost report to the FIs/MACs, which use these reports to reach final settlement with providers for Medicare payments.

The Provider Statistical & Reimbursement Report (PS&R) system provides reports to institutional providers to assist in the creation and editing of their annual cost reports. The PS&R System is populated daily with claims data from the FISS. The process for handling institutional claims and creating the FISS Paid Claim File (the primary input to the cost reporting process) is documented in

Findings:

The primary modest impacts for the ICD-10 Transition on the cost reporting process are the reformatting of the FISS Paid Claim File, and updates to the PS&R System to receive and store claims with expanded ICD-10 codes. The changes required for the PS&R System are limited, since ICD codes are stored in the PS&R System, but not utilized in reporting.

**Key Impact Findings – MODEST**

- The utilization of maps to translate ICD-9 codes to ICD-10 codes both forward and backward would be helpful to all areas impacted by the transition. The conversion of written materials will be more central to this group than electronic conversion in systems. Documents both posted on CMS web sites as well as hard copy publications will need to be updated.
- As, training and education is necessary to ensure adequate preparation, CMS should continue to publish outreach and education materials throughout the organization, as well as for business associates, contractors, and providers.

**Overview of Lessons Learned And Recommendations**

**Lessons Learned**

- **High impact areas are localized.** Of the 19 impacted business processes identified, 9 were deemed high, 4 were deemed medium, and 6 were deemed modest impact areas. The majority of other areas within CMS will not be directly exposed to the work of the transition.

- **Policy changes will not require additional resources.** However, systems, databases and repositories impacted by the transition will require additional resources for modifications compliant with ICD-10 syntax.

- **The transition to ICD-10 will require system updates that include field size expansions and logic modifications.** Contractors working on impacted systems will first modify field sizes for Version 5010 implementation. Additional work will be required to modify the algorithms required for processing ICD-10 coded data.

- **An electronic mapping tool is highly desirable to streamline the conversion tasks and minimize conversion costs.**

- **The FIs/Carriers/MACs currently update claims systems manually when new and updated codes are published.** An electronic version of the
updated codes would enable the FIs/Carries/MACs to limit entry errors and improve productivity.

- CMS should evaluate the need to convert historical ICD-9 data once the ICD-10 transition has been completed.

**Recommendations**

- Centralized monitoring and control of the transition activities should continue.

- CMS internal communication regarding the transition to ICD-10 needs to be extensive.

- CMS should complete a detailed assessment of the impact ICD-10 will have on the organization, business associates and contractors by continuing with a more detailed system assessment building on these initial findings.

- Additional assessments of state systems should be conducted to evaluate the costs the states will incur by the transition and to ensure compatibility of data.