



As part of the seventh annual Clinical Documentation Improvement Week, ACDIS has conducted a series of interviews with CDI professionals on a variety of emerging industry topics. **Caryn Nowak, RHIT, CDIP**, a clinical documentation integrity specialist at Rady Children's Hospital in San Diego and a member of the 2017 CDI Week Committee, answered these questions on CDI and technology. Contact her at cnowak@rchsd.org.

Q How long have you had electronic health records?

A At Rady Children's Hospital—San Diego (RCHSD), we began our EHR journey with a phased approach. In August of 2009, we began with the emergency department and some outpatient clinics and phased in the remaining ambulatory clinic locations throughout 2011.

In September 2011, inpatient and ambulatory surgery records transitioned to electronic. Currently, we are fully electronic, enterprise wide.

Q: Have there been any real sticking points with the transition to full electronic systems?

A: We have had great success in transitioning to an electronic system through leveraging interdisciplinary collaboration and governance. The leadership and medical staff have been supportive throughout.

The EHR and revenue cycle steering committee provided excellent governance for the whole process.

Midway through our first five years, there was a brief pause to allow for workflow optimization, particularly for clinicians. For HIM and hospital coding professionals, leveraging technology and system tools such as computer-assisted coding (CAC) allowed for a smooth transition with the EHR as well as ICD-10.

Q What are the next steps to make sure everything continues to run smoothly?

A The next step to ensure processes run smoothly is being ahead of the game through innovation, integration, and collaboration. The clinical information services team and HIM clinical informaticists are continuously identifying new ways for innovation. The clinical informaticists perform robust testing scenarios and test workflows with each system upgrade. Both teams work together as a collaborative effort with the same end goal in mind.

Q RCHSD has leveraged innovation and interoperability between EHR and other systems to ensure smooth and efficient systems.

A **Do you have an electronic query system separate from the EHR?**

The RCHSD query to the clinician is generated through an EHR inbox message. The clinicians are then prompted to update the documentation in the actual note as well as the hospital problem list, as the query is not part of the legal medical record.

RCHSD uses the CDI functionality within the CAC application for tracking and reporting query metrics on a monthly basis.

The CDI team receives a weekly productivity report capturing CDI reviews, query response rates, and pending queries.

Q **Do you have staff who work remotely now that you are electronic?**

A At the start of the program over six years ago, the CDI team worked on the inpatient units, but when the EHR went live in September 2011, they moved into the HIM department. The team has since moved to a hybrid schedule, with two days working on the units, two days remote, and one day in the off-site HIM department.

The day the CDI team is in the HIM office together allows for sharing of ideas and teamwork. The CDI team has a buddy system where a more experienced CDI staff member works with a newer member of the team while on-site at the hospital.

On the hospital days, the CDI team members have the opportunity to meet with each other to discuss case scenarios. The CDI team appreciates the hybrid schedule, which allows for flexibility in their work schedules.

Q **How has the partial move to remote staffing affected productivity and physician engagement with the CDI team?**

A The CDI team is productive regardless of their location; however, being able to be on-site in the hospital allows for relationship building. It gives them the ability to work face-to-face with clinicians, ask

verbal queries, and attend departmental rounds, which are all integral to building and maintaining relationships with our customers, the clinicians. In my opinion, these opportunities would not be possible if the staff was working 100% remotely.

Q **How do you handle team education?**

A Every Monday, the CDI staff works in the HIM office and has a weekly huddle. The team brings forth topics they wish to discuss. Examples of challenging case scenarios are presented and discussed as a team until a consensus is reached. Once a month, the inpatient coding staff come on-site for a meeting with the CDI team. This monthly meeting allows for face-to-face time with their peers, relationship building, and team collaboration.

Q **Were there challenges related to the CDI team conducting reviews in the EHR or challenges facing physicians following your EHR implementation?**


A Originally, the CDI staff were on the floors with a paper chart. If the CDI team had a question, they would walk over to the clinician with the paper chart in hand. The clinician would hover over the chart, and the two would have a discussion. When the EHR was introduced initially, there was a struggle for both the clinician and the CDI team as a new workflow was in place. Change can initially present its own challenges, but in the end, it's beneficial for ease of workflow.

Q **Are note bloat and copy/paste a problem at your facility? If so, how are you working to combat it?**

A The documentation is validated by CDI staff to ensure the current conditions are documented within the medical record. If the CDI staff notices a discrepancy or needs clarity, a query is placed for clarification with the clinician. The clinical informaticists within HIM assist with ensuring workflows are functional from the clinician perspective and can troubleshoot note template issues. The clinical decision support committee is

supportive with the copy/paste initiative based on hospital policy.

How have you leveraged technology to improve CDI efforts?

 We use reporting in the EHR to ensure the hospital problem list is completed enterprisewide. Reports created by clinical informaticists enable the CDI team to query for any blank hospital problem lists within the medical record without having to review every single inpatient encounter.

Since RCHSD is a pediatric organization, ensuring that the hospital problem list is updated with the current conditions receiving treatment is vital. A complete hospital problem list allows for a more thorough clinical picture of the patient at the time of the encounter.


Any discrepancies or clarifications need to be queried to confirm if the diagnosis was current and actively being treated. The idea is that if the hospital problem list is reviewed for accuracy for each encounter, then the next time the patient presents at RCHSD, any chronic conditions would already be reflected on the problem list.

Although the CDI team has sent queries for blank hospital problem lists since 2013, the team began leveraging reports in November 2016. Since we began utilizing reports within a matter of months the amount of queries decreased by half.

Now, the majority of RCHSD clinicians have completed the hospital problem list before the CDI team performs their first review. The success with the hospital problem list project has allowed the team to begin looking for new

ideas of how to leverage system reports to identify additional opportunities.

What advice do you have for people transitioning to EHRs?

 The best advice is to understand how the system works: understanding the why behind the what.

Collaboration is also essential for success. If CDI is able to help answer a question for a clinician, helping them improve their workflow, a positive relationship can be cultivated. The CDI team is providing enhanced customer service to clinicians, which in the end helps with the overall documentation workflow.

The makeup of our CDI team is unique in that we have a mix of nurses, coding, and HIM professionals with different backgrounds. The team also has a former ICU nurse, who was also a clinical informaticist. Having a former EHR informaticist on the team has helped identify, note, and fix issues with clinician note formatting and templates.

Conversely, one of the HIM clinical informaticists was formerly a CDI team member. They understand the CDI workflow and are a valuable asset when it comes to identifying and correcting workflow issues. Another CDI team member has an information technology background and has received additional EHR training, hence the CDI team is equipped to help clinicians troubleshoot issues when they are working on the units.

The cohesiveness of the different backgrounds has allowed for process improvement, innovation, leveraging system tools, relationship building, and knowledge sharing amongst the team.

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The use of technology has become a requirement for most modern Clinical Documentation Improvement programs. The right software can bring consistency and efficiency. But not all software is created equal. You should look for tools that, at a minimum, provide the following features and functionality.

Accurate Patient Census

This information is usually obtained from the HL7 “Admission-Discharge-Transfer” (ADT) messages in a Hospital Information System (HIS). The ADT messages also contain valuable information about payers which should be tracked to provide accurate reimbursement metrics.

Worklist Management

Cases for review should be automatically assigned to documentation specialists and physician advisors based on assignment rules that can be managed by the CDI manager. The ability to handle scheduled and unscheduled absences, as well as hand-off between staff members, is especially important.

Expertise to Enhance User Knowledge

True Artificial Intelligence (AI) provides answers to problems, eliminating the need to consult a human expert. When AI is applied to a CDI program in a built-in Expert System, it can analyze and interpret information from the patient’s chart.

For example, an expert system could look at a patient’s list of medications and laboratory results and suggest additional relevant diagnoses. It can notice that despite the use of an antibiotic, no bacterial infection code has been noted. It can help to find potential relationships and linkages among diagnoses and make inferences about things not yet fully documented.

While an expert system cannot be expected to be better than the human expert, it can automate and process large amounts of information, effectively cloning the expertise of the human expert. This becomes extremely helpful in improving efficiencies and in training new staff in the subtleties of CDI.

Increased Efficiency

Rather than attempting to prioritize charts to see which ones should be reviewed, a good tool helps to increase efficiency so that all targeted charts can be reviewed. As we move into the world of risk adjustment, using prioritization to cherry-pick reviews will be less and less effective.

If you pick your most “acute” patients based on admission codes, patients with chronic conditions are likely to be overlooked. A DRG with a high weight does not necessarily equate to a high-level Risk Adjustment Factor (RAF) score. Remember, it’s the chronic conditions that make a major contribution to the RAF score.

AHIMA/ACDIS-Compliant Query Library

A complete library of query templates ensures consistency and compliance across all CDI staff, helps to avoid leading queries, demonstrates a broad coverage of topics (not just those that lead to higher reimbursement), and provides an auditable query process.

Information from physician responses should directly populate metrics and code lists to help improve accuracy and efficiency.

Minimal IT footprint

Hospital Information Technology (IT) departments are quite busy these days, making a web-based application an attractive proposition. The IT department has no hardware or software to install, configure or maintain, as

the software vendor takes care of all of that for you, and the time to install is greatly reduced.

Timely and Meaningful Reports

There are situations where immediate access to up-to-the-minute information is important. For example, resolving documentation of possible Hospital-Acquired Conditions (HACs) and Patient Safety Indicators (PSIs), making sure the CDI specialist and the coder agree before the bill is sent, and resolving open queries before billing all require immediate access to the relevant data and reports.

Look for reports that are available at any time “on demand,” and able to be sent on a scheduled basis. For hospital systems, it is important that reports and data be available on a division- or enterprise-wide basis, without

requiring any work by staff to collect and aggregate the numbers from each hospital.

Promotes Collaboration

In addition to the obvious collaborations among CDI staff, coders, and clinicians, it is important to make data and communications available to other departments as well, such as Case Management, Utilization Review, and Quality Management. Facilitating internal notes and notifications goes a long way to breaking down barriers between departments.

The right technology tools can improve the quality, compliance and consistency of your CDI program, while making it more efficient and impactful. And at the end of the day, that should be the goal of everyone involved.