

Forum

Risk Management Foundation of the Harvard Medical Institutions

Supervision Issue Editors: Martha Byington and Ron Jeffries

2 The Changing Landscape of Supervision

by Martha Byington and Nancy Ostergard, A.R.M.

The nature of supervision-related claims may not be fully understood by those at risk.

4 Medical Assistants in the Office Setting

by Sally T. Trombly, R.N., M.P.H., J.D. and Joyce Kaszaneck

How to manage and monitor non-clinical staff with new roles and responsibilities.

5 Ob/Gyns and Midwives: Exploring a Collaborative Model

by Ron Jeffries and Martha Byington

An interview with the directors of the Ob/Gyn program at Harvard Vanguard Medical Associates.

7 Using Aviation Team Training Models

Gregory Jay, M.D., Ph.D., F.A.C.E.P.

Improving team performance in high-stress, high-stakes environments.

8 Case Law on the Standard of Care Applied to Residents

by Janet Barnes, J.D.

Should a resident be held to a less stringent standard than an attending physician?

10 Closed Claim Abstract: PA Supervision in Urgent Care

by Gloria Rawn, R.N., M.S., J.D.

11 Closed Claim Abstract: Resident Supervision

by John A. Hammond, R.N.

The Changing Landscape of Supervision

The traditional pyramid of health care—with the physician at the top above support staff responsible for the routine care of a patient—is not as solid as it once was. The modern labyrinth of roles and responsibilities can create problems and concerns for both the supervising and supervised caregivers: impeding communication and decision making. Within teaching institutions, like many of those insured by CRICO,¹ clinicians-in-training are always part of patient care, and problems related to supervision are likely to surface. At the same time, these settings are fertile ground for developing successful supervision models.

The Need to Know More

While malpractice claims citing supervision are not unexpected in the CRICO universe, their nature may not be fully understood by the caregivers potentially at risk. Indeed, two of the most frequent questions posed to Risk Management Foundation of the Harvard Medical Institutions (RMF) staff are: “Am I responsible for a [subordinate’s] actions?” and “Am I liable even though I’m just a [subordinate]?”

Ten years ago, supervision issues were evident in two percent of CRICO claims, accounting for eight percent of total indemnity payments. Today, supervision-related claims account for six percent of claims and 18 percent of indemnity payments. These claim increases have coincided with an eight percent *decrease* from 1989-1998 in the proportion of CRICO-insured MDs represented by house officers—the top defendant category in supervision claims (*Figure 1*). The continued prevalence of supervision issues in claims despite the decline of insured house staff indicates the need for better information on several levels.

- ◆ RMF has to continually communicate who may be held liable, who is covered, and for what.
- ◆ More experienced clinicians need to assess how much guidance clinicians-in-training require.
- ◆ Clinicians-in-training or others with less experience must recognize their limitations and seek consultation as appropriate.
- ◆ Non-clinicians need a work environment that recognizes increasing responsibility while minimizing risk.
- ◆ Institutions, networks, and office practices need to adopt care delivery systems that support collaborative practice among various professions.

CRICO Claims Data

RMF recently studied CRICO’s past 10 years of supervision-related claims (N=115) to identify factors behind those events and to investigate potential remedies. Here are some highlights of that study:

- ◆ Sixty (60) percent of CRICO’s supervision claims involved supervision of a resident or fellow.
- ◆ Only 15 of the 115 cases studied involved a supervision issue with a non-physician employee.
- ◆ Permanent injury or death occurred in 63 percent of the cases.
- ◆ The Emergency Department (ED) was identified in nine percent of supervision claims from 1989-1998 compared with 29 percent in the previous decade.
- ◆ Supervision issues in the operating room are reflected in the fact that defendants from anesthesiology and surgical specialties top this set of claims (*Figure 2*).

Since 1989, house staff have accounted for 35 percent of CRICO’s insured physicians, 25 percent of MD defendants named in all CRICO claims, and 17 percent of incurred losses. Among the set of claims involving supervision issues, however, the proportion of house staff defendants exceeds 50 percent. Very few supervision-related claims, however, named non-physician employees (nurses, PAs, technicians, etc.) as defendants.

During the 1980s, CRICO instituted a requirement that residents in insured institutions obtain approval from their clinical chief to moonlight outside the Harvard system and still be covered by CRICO. Since that policy change, the frequency of supervision claims occurring in the ED has decreased.

by
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Figure 1

CRICO’s Supervision Claims: 1989-98	
115 Cases/287 Defendants	
Category	Defendants
House Staff	105 (37%)
Attending Physicians	94 (33%)
Institution	64 (22%)
Employee	24 ^a (8%)
Total	287 100%
a includes 11 nurse defendants	
Defendant Configurations	Cases
H. Staff+Attnd.+Inst.	22 (19%)
H. Staff+Attnd.	17 (15%)
Inst. only	16 (14%)
H. Staff only	15 (13%)
Attnd. only	10 (9%)
Attnd.+Inst.	8 (7%)
H. Staff+Inst.	5 (4%)
Inst.+Emp.	5 (4%)
H. Staff+Attnd.+Inst.+Emp.	4 (3%)
H. Staff+Emp.	3 (3%)
Emp. only	3 (3%)
Other	7 (6%)
Total	115 100%

CRICO's Supervision Claims: 1989-1998

Responsible Service (Top 10)

	1989-93	1994-98	+/-
Anesthesiology	7	9	+2
Dentistry	1	5	+4
Emergency	3	7	+4
General Surgery	5	6	+1
Gynecology	2	3	+1
Internal Medicine	6	2	-4
Neurosurgery	2	3	+1
Obstetrics	4	3	-1
Orthopedic	1	7	+6
Psychiatry	2	6	+4
Total	42	73	+31

Change Factors

In the past, allegations of failure to supervise house staff traditionally included assertions that no attending was on site overseeing the work of the resident, i.e., that the injury occurred because the resident had no one to turn to when the case became problematic. Such allegations may have become harder to prove after 1996, when the Health Care Financing Administration clarified its guidelines to read:

"...if a resident participates in a service in a teaching setting [it will] pay for the services of a teaching physician under the physician fee schedule **only** if the teaching physician is present during the key portion of the service for which payment is sought."²

In addition, the standard of care for emergency medicine teaching programs accredited by the American College of Graduate Medical Education now requires 24-hour emergency department attending staff supervision.³

Supervision-related Claim Examples

1) A patient who became blind after undergoing surgery for a thoracic compression fracture alleged improper anesthesia administration. She named the institution, an anesthesiology resident, and a staff physician. The resident, who was only three weeks into his residency, stated that he did not feel proficient in the use of arterial lines for anesthesia monitoring. The case was settled in the high range (\$500,000-\$999,999).

2) A patient undergoing nasal polypectomies suffered a chemical burn to his eyes. Unbeknownst to the surgeon, a resident used a 70 percent solution of alcohol to prep the patient's face. A claim brought against the institution and both the staff and resident otorhinolaryngologists was settled in the low range (\$0-\$99,999).

3) A patient presented to the ED after suffering a puncture wound to his forearm. The ED staff physician instructed a resident to irrigate the wound with hibiclens and water. The claimant alleges the resident mixed equal parts of hibiclens and water and injected it into the wound. The resident had no recollection of how much solution was mixed. The patient subsequently complained of lack of arm strength, a deformed wrist, and occasional numbness in his fingers. The case was settled in the mid range (\$100,000-\$499,999).

A second change which may have an effect on the frequency of supervision-based claims is expanded involvement in patient care by non-clinical staff (see Page 4) and by clinical staff whose role was traditionally physician-defined. Some institutions and office-based practices may be asking these individuals to take on more sophisticated responsibilities without a clear understanding of the training and supervision needed to carry out these tasks.

In many settings, nurse practitioners (NPs) and physician assistants (PAs) now have their own patient panels—and more independence about when to seek assistance from a physician for a patient need or consultation. The assumption, by managed care organizations (MCOs) at least, is that such requests will be fewer because the NPs or PAs will be capable of handling most of the patient care problems they face. Regardless of the validity of those assumptions, if such a practice permits a non-physician clinician to not involve a physician in a patient's care, the physician's exposure for allegations of inadequate supervision may become moot.

Conclusion

On one hand, little has changed in the relationship between attending physicians and residents with respect to their roles in academic teaching. On the other hand, the setting is changing as care continues to migrate to the outpatient setting. In an environment of shorter hospital stays and shorter office visits, the pace of teaching becomes more hurried, and maintaining adequate supervision more challenging (see Page 7).

To date, relatively few of CRICO's supervision-related claims have involved non-physician clinicians, and none has alleged failure of supervision of medical assistants. However, as adjustments in health care insurance, reimbursement, and delivery encourage increased employment of non-licensed caregivers, changes in claim experience may follow. With a less clear definition of the place of the physician within the health care structure, and the expanded roles of other clinicians and non-clinicians, everyone providing care has to be clear about their roles and the roles of all others on the caregiving team. Responsibility for how those caregivers work together, and how the care of the patient is managed, however, ultimately still resides with the attending physician. That much has not changed. ■

Notes & References

- 1 Controlled Risk Insurance Company (CRICO) provides professional liability insurance to health care institutions, their employees, and affiliated physicians.
- 2 Health Care Financing Administration (HCFA) Teaching Physician Guidelines (15016). *Supervising Physicians in Teaching Settings*. May 1997.
- 3 Accreditation Council for Graduate Medical Education: *Program Requirements for Residency Education in Emergency Medicine*. June 1994.

Forum

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Medical Assistants in the Office Setting

What patient care tasks can I delegate to medical assistants?

The question is simple, the answer—certainly in Massachusetts—is not. Increases in the level and complexity of health care delivered in the physician practice have focused attention on managing and monitoring non-clinical staff, including medical assistants (MAs), with new roles and responsibilities.

The MA and the Patient

In general, MAs perform selected clinical tasks and administrative duties in the physician's office. Office practice evaluations conducted by Risk Management Foundation of the Harvard Medical Institutions (RMF) have revealed a wide variety of credentials, skills, supervision structures, responsibilities, and training among MAs in many of the practices reviewed.

Patients assume that MAs in the physician practice are trained, competent in the tasks they perform, and appropriately supervised to carry out those tasks. This trust should not be undermined. Patients should understand the role of the MA: he or she is not a nurse, nor physician assistant, nor any other licensed clinician. (Asking all practice staff to wear identification including name and title or function can help to avoid confusion.) By the same token, MAs—especially those who are certified—have clinically-based training which supports the delivery of services in the practice and performance of tasks to assist clinicians and the patient. .

Supervision of the Medical Assistant

Even though some MAs may administratively report to a non-clinician (such as the practice manager), *the ultimate responsibility for medical supervision is that of a clinician in the practice.* Supervising clinicians must be clear about the regulations of their licensing board in supervising non-licensed personnel, and the scope of tasks that can be delegated. Unfortunately, Massachusetts does not offer a clear interpretation of rules regarding MA supervision in office-based practices.¹

Questions about which duties are delegable to MAs vary depending on which regulatory agency guidelines are being interpreted. The Massachusetts Board of Registration in Medicine states that a *physician* may:

“...permit a skilled professional or nonprofessional assistant to perform services in a manner consistent with accepted medical standards and appropriate to the assistant's skills.”²

Rules of delegation and supervision from the Massachusetts Board of Registration in Nursing are more explicit, noting that a *licensed nurse* remains responsible for all nursing care a patient receives under his/her direction and:

“...is held accountable for all aspects of the delegation decision-making process, its implementation, supervision, and evaluation.”³

In addition, the Massachusetts Board of Registration in Nursing requires the nurse to determine that an unlicensed person has documented competency to perform the activity and prohibits the delegation of activities requiring ongoing nursing assessment/judgment:

“The nursing activity must be one that a reasonable and prudent nurse would determine to be delegable..., would not require an unlicensed person to exercise nursing judgment..., and [would not jeopardize the patient's welfare.]”⁴

Certification of Medical Assistants

Unlike some states, in Massachusetts, MAs are neither licensed nor regulated. However, formal training and certification programs are available. Requiring that all MAs in a practice be certified removes some uncertainty about which skills a MA should have. From a risk management standpoint, this promotes uniformity of training and care from practice to practice.

Some post-secondary medical assisting programs are accredited by the Commission on Accreditation of Allied Health Education Programs (CAAHEP). Graduates of CAAHEP accredited programs are eligible to take the medical assistant certification exam. The elements of the certificate exam require recertification every five years either by continuing education or examination. The components of the certification exam are:

- 1 General knowledge (medical terminology, anatomy, and physiology; professionalism; communication; and medicolegal guidelines/requirements).
- 2 Administrative knowledge (office systems).
- 3 Clinical knowledge (infection control, treatment, assisting the physician, taking a history, collecting and processing specimens, preparation and administration of medications, emergencies, and first aid).

Candidates who pass this examination are awarded the CMA credential.

by
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Training the MA in the Physician Practice

In private practices, physicians are responsible for the training level of all non-licensed staff. MAs not only need to be fully trained in the tasks delegated to them, but should have periodic objective review of current competencies.

Training must be more structured than simply assigning new MAs to work alongside experienced MAs. A senior person—perhaps the practice administrator in concert with either the physician or nurse—should put together a training program delineating the scope of the MA's responsibilities, including criteria for ongoing monitoring and clinical supervision.

In addition to an ongoing training program, the following recommendations can help reduce liability risks for practices employing MAs:

- ◆ Determine (and document) which regulatory board guidelines will determine tasks that are delegable.
- ◆ Identify who can delegate duties to non-licensed staff.
- ◆ Outline duties that may be performed by non-licensed staff members.
- ◆ Maintain a list of the specific duties that each delegator has authorized.
- ◆ Require supervisors to verify and document training and periodic reviews.
- ◆ Keep copies of staff certification on file. ■

Notes & References

- 1 This article addresses issues relating to private offices only. In Massachusetts, at least, clinics regulated by the state have different delegation guidelines.
- 2 Chapter 243 of the Code of Massachusetts Regulations, Section 2.06(4).
- 3 Massachusetts Board of Registration in Nursing Advisory Ruling 9803. March 1998
- 4 Ibid.

Supervising MAs Outside MA

Outside Massachusetts, the states of New Jersey and Washington have become organized and influential relating to the role of non-licensed staff.

In 1996, an agreement was reached between New Jersey's Department of Public Health and its Board of Medical Examiners to formulate a Limited Permits Program for non-licensed staff. This program puts restrictions on the type of procedures that the MA may perform. MAs who have achieved certification without attending a CAAHEP program are required to participate in a separate training program before they are allowed to administer medications.

In Washington state, practitioners are not allowed to delegate invasive procedures unless a completed and current certification/delegation form is on file with the Department of Licensing. This certification is valid for two years and is the responsibility of the delegating practitioner. Each delegator must maintain a list of the specific medications/diagnostic agents and the route(s) of administration of each that he or she has authorized.

-STT

Ob/Gyns and Certified Nurse-Midwives

Exploring A Collaborative and Interdependent Model

by
Ron Jeffries and
Martha Byington

Many obstetricians cite their responsibility for the clinical care provided by nurse midwives with whom they collaborate as an area of concern and potential liability. Review of CRICO¹ data indicates that the issue is less prevalent in malpractice claims than physicians might expect: just seven claims against midwives, or physicians supervising midwives, in CRICO's 23 years of existence. This implies that the working relationship between obstetricians and midwives in the Harvard-affiliated obstetrical programs is not a high risk way to practice. In fact, MDs and certified nurse midwives (CNM) who practice collaboratively deserve credit for keeping those claim numbers low.

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The Team Model Approach

Collaboration between CNMs and MDs is achieved in various ways within the Harvard institutions. Several programs use a team model with CNMs and MDs together providing gynecologic and obstetric patient care. Although supervision plays a role in these models, they *emphasize* the importance of collaboration.

At Boston-based Harvard Vanguard Medical Associates, the model emphasizes collaboration and interdependence between these two groups. Harvard Vanguard's mission states that "a team of professionals with different skills can work together to provide superior health care to women." In addition to CNMs providing care to the pregnant patient, up to and including delivery, NPs in the Harvard Vanguard system also provide primary gynecologic care to a woman in the office and/or hospital setting. The patient decides whether the primary caregiver will be a nurse or MD.

Portions of *Forum's* discussion with the physician, nurse midwives, and nurse practitioner directors for Harvard Vanguard's ob/gyn program follows.

Forum: *What ob/gyn care options are offered under the Harvard Vanguard program?*

Elizabeth Buechler, M.D., Physician Director of Harvard Vanguard's Ob/Gyn Program:

Every patient should have both a physician and another advanced practice clinician who will provide her care through pregnancy. Every woman who has a complex gynecologic problem is directed to a physician, others may choose to get care with a nurse practitioner, or with a physician.

Continued on next page

When is that choice offered?

Dr. Buechler: In gynecology, it's when the patient joins the system. If she calls for an annual exam, the person making the appointment will ask "Do you know whom you want?"

We try, a little bit, to convert those who don't have a preference. I think it's ideal to have them see a nurse practitioner or the midwife in the office, because they are likely to get more time for counseling and education. Often people have no idea about the role of a nurse practitioner and "only want to see a doctor." In my practice, I will see that type of patient on the initial visit and go over everything. But, at the end of the visit, I will discuss with her the value of being followed by the CNP and RN on my team.

How involved is the physician in routine care?

Dr. Buechler: If a patient chooses to see the nurse practitioner, she won't have any involvement from the physician. If she chooses to get her care from the physician, then she'll meet with the physician.

What about the patient who, at first blush seems routine, but who may have clinical issues beyond the ken of an NP?

Suzanne Olivier, Director of Nurse Practitioners for Harvard Vanguard's Ob/Gyn Program:

If anything seems at all suspicious or confusing to me, or I'm not sure I'm on the right track, I want a strong physician partner. I don't have the same depth of experience. When I come up with something that confounds me, I turn to the physician and say "I need help." We work together.

Who does what for the obstetrical patients?

Dr. Buechler: Office care is carried out by a combination of midwives, nurse practitioners, physician assistants, and physicians. We have some or all of these care providers in all the Harvard Vanguard centers. At several of the delivery sites, Harvard Vanguard has nurse practitioners who do rounds on hospital patients. They are primarily providing parenting education, demonstrating or explaining things like how to hold the baby, how much the baby is going to cry for the next two weeks, how much the mother is going to cry...post-partum blues...that important stuff. We recently put the NPs in because we believe they do an excellent job of patient education, and allow the physicians to focus their time on patients who are sick.

The working relationship between obstetricians and midwives in the Harvard-affiliated obstetrical programs is not a high-risk way to practice.

CRICO's claims naming nurse midwives and MDs as co-defendants primarily relate to care during delivery. Do you worry about whether the nurse midwife is going to know when the case is too complicated, when to call in the MD?

Dr. Buechler: That's a universal concern among obstetricians. You always want to be called 20 minutes before you were. It's easy to say, "If only I'd been here a little before." Realistically—most of the time—it's probably not true.

But, if you truly have a collaborative practice, you can go by and note three patients in labor, and ask "What's happening?" It isn't rude to say "Do you need any help?" When you're covering, you look on each other as partners.

Shirley Kamorowski, Director of Harvard Vanguard's Nurse Midwives:

When clinicians work as a team throughout the pregnancy, they get a sense of when to call and when not to call. Also, the nurse midwives have worked closely with the physicians and know what they are comfortable with.

Is that the case from the physician perspective?

Dr. Buechler: Yes, the more you know each other, the better off, the more intelligible the communication. So I think that's an important piece of it. Which is not to say physicians don't have worries. But I don't think we have more problems from the midwives than we have from the physicians.

How do the various Harvard Vanguard Ob/Gyn caregivers communicate with one another?

Dr. Buechler: We don't have an official M&M, but we do have a QA committee of midwives and physicians. They have some indicators on cases reviewed, but we also do a lot of provider-referred reviews as well. Periodically we send around a maternal fetal medicine specialist to go over whatever issues have come up since the last time she came. She will pick out themes and provide a little education.

We have all of the physicians in a group meet together on a regular basis, and the midwives and nurse practitioners meet amongst themselves periodically as well, to talk about business or educational things. We do a lot of, "I've got this patient—what do you think of that."

Also, each physician-nurse team does a chart review every two weeks of all patients under their care.

This sounds like a good plan for the providers, but is it better for patients than a physician-only relationship?

Dr. Buechler: There are advantages for doing it all yourself, one is you see them 13 or 14 times, and get to know them really well. The disadvantages are that they only get your perspective, and all of us have things we do better than others. It's nice to collaborate with an advance practice clinician who's good at the things you are not so good at, and vice-versa. ■

1 Controlled Risk Insurance Company (CRICO) provides professional liability insurance to health care institutions, their employees, and affiliated physicians.

An Alternative to Supervision

Using Aviation Team Training Models

by
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In hopes of improving the quality of patient care, increasing staff efficiency, shortening patient stays, and reducing medical errors, Rhode Island Hospital (RIH), in Providence, has re-organized its emergency department (ED) staff into “MedTeams.” RIH is one of 11 hospital EDs currently employing a teamwork model originally designed for the United States Army and Air Force.

The supervision model, designed the Dynamics Research Corporation (DRC) of Andover, Massachusetts, provides methods to improve team performance in high-stress, high-stakes environments. Data based on DRC’s work with Army and Air Force aviation fleets demonstrate that mission performance improved in excess of 20 percent and safety-related task errors were reduced by 40 percent.¹

In collaboration with Brown University and Rhode Island Hospital, DRC studied 54 medical malpractice claims from eight EDs across the United States for “teamwork failures,” i.e.:

- failure to apply problem solving strategies,
- failure to execute plans and manage workload, or
- failure to maintain team structure and climate.

Reviewers identified 476 teamwork failures, an average of almost nine per case. They estimate that effective teamwork could potentially save \$350,000 in malpractice costs (indemnity and expenses) per 100,000 ED visits.

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is one of 11 EDs
currently employing a
teamwork model originally
designed for the
US Army and Air Force.*

The MedTeams Approach

A fundamental tenet of DRC’s MedTeams approach is that teamwork is a learnable set of skills. Unlike traditional team development—with its focus on group dynamics and interpersonal relationships—the MedTeams program focuses on a concrete set of understandings and behavioral skills applicable in the emergency environment. All ED personnel take a 10-hour course (together) to learn how to break down systemwide barriers that cause adverse events.

The program consists of five parts:

- 1 Maintaining the Team Structure and Climate
- 2 Applying Problem Solving Strategies
- 3 Communicating within the Team
- 4 Executing Plans and Managing Workload
- 5 Improving Team Skills.

The team system leads to a number of shifts in traditional ED work patterns, including:

<i>From</i>	<i>To</i>
A single focus on clinical skills	A dual focus on clinical and team skills
Reactive practice	Proactive practice
Having information	Sharing information
Self advocacy	Mutual support
Minimizing errors	Improving quality
Self improvement	Team improvement.

The program distinguishes among three types of medical error: slips, lapses, and mistakes, each of which must be identified and managed differently. *Slips* and *lapses* result from having a good plan with poor execution due to a memory problem or action problem. A *mistake* stems from having a bad plan with excellent execution.

Several assumptions were made in the creation of this program. First, most ED personnel are not formally trained to work in a team structure. Physicians, nurses, and medical assistants normally operate independently and only collaborate when the need arises, and then only within the scope of clearly defined responsibilities.

Second, medicine traditionally has been an authoritarian field in which a physician’s orders are seldom challenged by nurses or other staff. Significant problems often occur because people don’t talk to each other, causing error chains which may lead to adverse events. The MedTeams approach addresses some of the common infrastructure issues in the ED that may lead to medical error.

Implementation at Rhode Island Hospital

The first big change which the Rhode Island Hospital Emergency Department initiated was to divide the entire ED staff into two teams: Blue and Green. This identification even extends to clothing: scrubs are either blue or green, so that everyone, including patients and families, can tell who belongs to each team.

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Using Aviation Team Training Models

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Patient “ownership” begins in triage when patients are assigned to one of the two teams. The triage nurse can tell the patient in triage who her attending physician is going to be—humanizing the triage process. As patients are assigned at triage to one team or the other, their names go up on a centrally located white board. The white board is also used to track the patient through the ED, so that anyone on the team can determine any patient’s status. This has the additional benefit of reducing the patient stay in the ED because the white board creates an awareness about how many patients are waiting and what they are waiting for.

The restructuring of the ED staff and patient flow at RIH was augmented by changes in the ways teams communicate with each other. The focus is on professional courtesies and respect with specific communication tools to assure that this occurs. Prior to the initiation of the teams, staff tended to seek out the attending with whom they felt most comfortable, not necessarily the attending in charge of taking care of that patient. That practice increased the risk of triggering a chain of miscommunication and potential error. The MedTeams approach offers two tools to overcome communication barriers and resolve conflicts. The first is a “D.E.S.C. script”

Describe the action

“Nick, this is the second time today you criticized me in the presence of a patient.”

Express your concerns

“This impacts my credibility with the patient and my effectiveness in caring for him.”

Suggest other alternatives

“I prefer you discuss any issues you have with my work outside the patient’s room.”

Consequences should be stated.

“I can benefit from your feedback without losing credibility with patients.”

A second problem-solving strategy is called the **two challenge** rule which requires that a team member voice his or her concern at least two times to assure that it has been heard. If this occurs without an acceptable outcome, the challenging member must

The ED setting is uniquely situated to replace the traditional lines of supervision with a team-based approach to care.

take a stronger course of action. All members of the team must be willing to collaborate to come to consensus. In reality, the experience at RIH shows that it usually requires just one challenge for a discussion about the treatment plan to occur and perhaps be modified.

Additional changes include teams **signing out** to other teams. Historically, nurses have signed out to nurses, physicians to physicians, each discipline functioning alone. In this model, a team signs out to a team and transfers a shared mental model about a patient’s care. In addition to the communication that occurs when a team signs out to another team, are ad hoc team conferences held throughout the shift to discuss the status of each patient, and to determine ways to expedite his or her care.

Another important element in this program is the assignment of **roles**. A “role” is not a person, and a single individual may play different roles at different times, for different situations. Team roles in the ED include a Designated Team Leader, a Situational Leader, and Follower(s). The **Designated Team Leader** is typically a physician, since the MD is ultimately responsible for determining the patient’s course of treatment; he or she is the titular leader of the ED team. In certain situations, however, leadership can be assumed by another member of the team. The **Situational Leader** could be, for example, a nurse with particular knowledge of the bed situation and could lead the effort to move admitted patients out of the ED, freeing up space. All members of the team can and will be **Followers** in different situations. Followers are as important to the success of the team as leaders.

The ED setting is uniquely situated to replace the traditional lines of supervision with a team-based approach to care. Rhode Island Hospital is in the process of applying specific measurements to the success of its new program, including the patient’s length of stay, patient satisfaction, and staff satisfaction. ■

1 Dynamics Research Corporation. *Team Performance in Emergency Medicine*. <http://teams.drc.com/html/brochure.html>.

Case Law on the Standard of Care Applied to Residents

The standard of care to which house officers (residents and fellows) are held has important implications in the level of supervision they require. In 1968, the Supreme Judicial Court of Massachusetts (SJC) decided the case of *Brune v. Belinkoff*, abandoning the “locality rule” used to define the standard of care in medical malpractice cases.¹

Should a resident be held to a less stringent standard?

Previously, a defendant physician was “bound to possess that skill only which physicians and surgeons of ordinary ability and skill, practicing in similar localities, with opportunities for no larger experience, ordinarily possess.”² A rural physician under this rule was not expected to possess the (higher) degree of skill possessed by physicians practicing in large cities,³ as a matter of fairness.

by
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In place of the locality rule, the SJC held that a general practitioner should be expected to meet the degree of care and skill of the average qualified practitioner, taking into account the advances in the profession and allowing consideration for the medical resources available to the physician.⁴ A specialist should be held to the standard of a specialist.⁵ With this ruling in *Brune*, Massachusetts fell in line with other court decisions around the country.

If Massachusetts courts were to apply this standard when dealing with general practitioners and specialists, what standard would they apply to physicians in training? Should residents be held to a lower standard? Certainly, a physician two years out of medical school has less experience and training than a physician 20 years out of medical school.

St. Germain

In 1994, the case of *St. Germain v. Pfeifer* offered the SJC the opportunity to address the resident physician standard.⁶ The plaintiff, Joseph St. Germain, had undergone a mid-lumbar osteotomy to correct a spinal deformity. Although the attending surgeon's plan was to confine St. Germain to his hospital bed for four or five postoperative days, a first-year resident wrote orders to move the patient to a chair just two days after the procedure.⁷ The nursing staff carried out the resident's orders, and the newly-placed fixation hooks and rods slipped out of place in the patient's back.⁸ Despite additional surgery, he developed permanent neuropathy. St. Germain filed a malpractice suit and the tribunal finding was in favor of several physician defendants, including the first-year orthopedic resident.⁹

When St. Germain appealed the tribunal finding, the resident physician argued that the plaintiff's expert did not apply the duty of care appropriate to first-year residents. He was essentially asking that a different standard be applied to more junior physicians.¹⁰ After reviewing cases from two other jurisdictions, the SJC rejected this argument.

Influential Cases

One case the Massachusetts SJC reviewed was *Centman v. Cobb*.¹¹ In 1991, the Indiana Court of Appeals had held that interns and first-year residents are "practitioners of medicine required to exercise the same standard of care applicable to physicians with unlimited licenses to practice."¹² The SJC also considered the 1982 ruling in *Jenkins v. Clark*, an Ohio medical malpractice case against a first-year resident.¹³ In *Jenkins*, the Ohio Court of Appeals upheld a trial judge's instruction that the applicable standard of care for a first-year resident was "that of reasonably careful physicians—not that of interns or residents."¹⁴

The SJC stated that "we decline to apply a lower standard of care to residents from that we apply to other physicians."

Adopting the logic of the Indiana and Ohio courts, the Massachusetts SJC stated in *St. Germain* that "[w]hile this issue has not yet been addressed in Massachusetts ...[we] agree with these opinions and we decline to apply a lower standard of care to residents from that we apply to other physicians."¹⁵

No Specific Standard, Yet

Although the SJC has taken the position that it would not be inclined to accept a "lower" standard for interns or residents, it has yet to formulate a standard specifically for residents. In a 1996 Massachusetts case, *Jarry v. Corsaro*, the plaintiff appealed jury verdicts in favor of two physicians—a first-year resident and a second-year resident—in a medical malpractice case.¹⁶ The plaintiff claimed the jury instructions were erroneous regarding the standard of care to be applied to the residents.¹⁷ Specifically, the plaintiff objected to measuring the residents by the general practitioner standard set forth in *Brune v. Belinkoff*. Believing the residents had held themselves out as pediatric specialists, the plaintiff argued that they should be held to that standard instead.¹⁸ However, the issue was not raised until after the trial, and therefore was not preserved for appeal.¹⁹ Thus, the question remains whether or not a resident in a specialty program will be held to the standard of care for a generalist or a specialist.

In the four years since *St. Germain* and two years since *Jarry*, a case has yet to emerge that would allow the Appeals Court or the SJC in Massachusetts to address the standard of care for residents issue head on. Until such time as that occurs, resident physicians with limited licenses to practice medicine who unfortunately find themselves defendants in medical malpractice cases, can expect that their actions will be judged as practitioners of medicine with "unlimited licenses to practice."²⁰ As case law supports the notion that the standard for house officers equals that of more experienced physicians, their ability to provide that level of care must be ensured through adequate training and supervision. |

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Notes & References

- 1 *Brune v. Belinkoff*, 354 Mass. 102 (1968).
- 2 *Small v. Howard*, 128 Mass. 131 (1880).
- 3 *Brune*, 354 Mass. at 104.
- 4 *Id.* at 109.
- 5 *Id.*
- 6 *St. Germain v. Pfeifer*, 418 Mass. 511 (1994).
- 7 *Id.* at 514.
- 8 *Id.* at 515.
- 9 *Id.* at 518.
- 10 *Id.*
- 11 *Centman v. Cobb*, 581 N.E.2d 1286 (Ind. App. 1991).
- 12 *Id.* at 1289.
- 13 *Jenkins v. Clark*, 454 N.E.2d 541 (Ohio App. 1982).
- 14 *Id.* at 551.
- 15 *St. Germain*, 418 Mass. at 519.
- 16 *Jarry v. Corsaro*, 40 Mass. App. Ct. 601 (1996).
- 17 *Id.* at 603.
- 18 *Id.* at 606.
- 19 *Id.* at 607.
- 20 *St. Germain*, 418 Mass. at 519.

PA Supervision in Urgent Care

A 38-year-old woman experienced complications, infection, and hospitalization following treatment at an urgent care center for an accidental knife wound to her hand.

Clinical Sequence

A 38-year-old woman presented at an urgent care center with a deep hand laceration. She was triaged by a physician's assistant (PA), and sent to the surgery department where she was treated by a nurse practitioner (NP). The NP irrigated, sutured, and dressed the wound. The patient was verbally instructed on wound care and the signs and symptoms of infection.

The next day, the patient called the center with complaints of extreme pain in her hand. The treating NP prescribed Tylenol with codeine. Five hours later, the patient called the NP again stating that the pain medication had been ineffective and that she was now having chills. The NP advised her to take an anti-inflammatory agent. Later that day, the patient called the center again reporting a fever. She was seen that evening by the PA who had done her initial triage.

The PA examined the patient's hand and found the wound to be reddened, swollen, and hot. A lymphangitis (red streaking) was also noted which extended just distally to the antecubital fossa, indicating that the lymphatic system was also involved in the infection process. The patient was febrile (100°F) even after several doses of ibuprofen. The PA diagnosed abscess formation, lymphangitis, and significant cellulitis.

After consulting with the covering surgeon, the PA removed six of the nine sutures and observed spontaneous evacuation of purulent material, including old non-clotted blood. The wound was cultured, irrigated with saline and peroxide, and dressed. The lymphangitis and cellulitis were delineated.

The patient was given intravenous antibiotics and discharged home on oral dicloxacillin. A follow-up appointment was made for the next morning. She was instructed to keep the limb elevated and go to the ED if fever or chills developed. Subsequently, the CBC revealed a WBC of 17,000, and the culture was positive for streptococcal and staphylococcus organisms.

The following morning, the patient presented at the center with severe pain with passive motion of the digits and increased edema. She was admitted to the hospital, underwent three irrigation and debridement procedures, and received IV antibiotics. She was discharged home with occupational therapy and IV antibiotics. She was left with scarring and some loss of function of her left hand.

Claim Sequence

The patient filed a claim against the covering physician, the PA, and the NP claiming improper supervision, improper care, and unqualified personnel providing care.

Disposition

Following an unsuccessful tribunal finding, the claim was settled in the low range (<\$100,000).

Discussion Points

Documentation: The patient argued that the possibility of infection was not promptly addressed despite her multiple calls complaining of pain.

Document that patient calls were received and that appropriate questions were asked. Multiple patient complaints within a short period of time should trigger further inquiry. Increasing pain or other evidence of infection should prompt immediate evaluation. Although the additional visit may be inconvenient for both the clinician and the patient, serious complications can often be identified more quickly or avoided altogether. Offers to see patients regarding their complaints that are refused should also be documented. (Information that is not in the medical record is often more troublesome than what is actually recorded.)

Communication: One issue in this case is the degree of pain that the patient complained of and how that misunderstanding ultimately affected her care.

For thorough documentation and continuity of care, ask patients to rate their pain on a scale of 1 to 10. This helps provide a frame of reference, specific to that patient, for evaluating the pain over time.

Communication: Although the surgeon did not see the patient, the supervising physician at the urgent care center briefly examined the patient's wound. The patient, believing she was never seen by a physician, stated in her letter of complaint that, "another man came in and assisted a bit, but I didn't know who he was."

When NPs and PAs treat patients, the physician's involvement should be explained to the patient.

Supervision: The plaintiff argued that the PA and NP were improperly supervised.

The treating NP was qualified to treat this type of wound. The following day, when the patient's infection became apparent, the PA consulted with the supervising surgeon and followed his suggestions. The PA consulted the in-house physician who looked at the wound, concurred with the treatment plan, and deferred to the covering surgeon. Experts who reviewed the case for the defense stated that, had a physician seen the patient sooner, the treatment would not have changed.

Management: The plaintiff alleged that the standard of care was breached when the NP failed to prescribe an antibiotic when the wound was sutured.

Discussing with the patient the reasons not to prescribe antibiotics (possible reactions, infections can still occur) would have informed her that a treatment plan had been formulated rather than that an omission had occurred.

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Resident Supervision

A 68-year-old woman had undiagnosed abdominal bleeding three days after a cardiac catheterization. She became comatose following emergency exploratory surgery and died two weeks later.

Clinical Sequence

A 68-year-old woman was admitted to the hospital for cardiac catheterization due to persistent angina. Angiography via the right femoral artery was performed. The next day she was asymptomatic, remaining on heparin in anticipation of percutaneous transcatheter angioplasty.

On the third post-catheterization day, the patient began having cramping abdominal pain. She was given an enema with good results which were negative for occult blood. At midnight, her lower abdominal pain continued despite several soft, moderate stools. By 2:30 a.m., with continuing pain and slight nausea, her nurse called the junior medical resident on-call. The patient's heart rate was in the 70s and her blood pressure had dropped.

Since the patient had received a doubling of her diltiazem (from 30 to 60mg) four hours earlier to manage her angina and blood pressure, the resident ordered an IV of normal saline with calcium gluconate to counteract the diltiazem and begin fluid replacement. After a transient slight rise, her blood pressure dropped and the resident was called again. An abdominal X-ray done at 3:30 a.m. was read as normal with a large amount of stool. The pain persisted, normal saline ran wide open, and the blood pressure was 70 systolic, pulse 76.

At 4:30 a.m., the nurse called the same resident and asked to give a tap water enema. At 5:30 a.m., having been unable to obtain an oxygen saturation secondary to cold, blanched fingers, the nurse called the resident again. The patient's temperature was 94.5°F and she was becoming disoriented. At approximately 6:00 a.m., the resident called the third-year cardiology fellow and, together, they decided to get a hematocrit which had now dropped from 34 to 20 over the previous 24 hours. Transfusions were ordered and the heparin discontinued.

At 7:10 a.m., the resident called the attending cardiologist who suspected abdominal bleeding. At 8:00 a.m., the attending saw the patient, ordered Protamine, surgical consults, a PA line, continuing blood replacement, and an emergency CT of the abdomen. The attending indicated to the resident that he should have known that something more serious was occurring.

In the face of persistent acidosis and DIC, exploratory surgery began at 2:30 p.m. A large pre-peritoneal blood collection was found anterior to the bladder. Surgery revealed that cardiac catheterization had led to an injury of the right inferior epigastric artery and that the left femoral venous catheter had entered the hematoma. The patient was critically ill at the end of the procedure and remained unresponsive until her death two weeks later.

Claim Sequence

The patient's estate filed a malpractice suit against the resident alleging a delay in diagnosis.

Disposition

Following an unfavorable tribunal, the suit was settled against the resident in the high range (\$500,000-\$999,999).

Discussion Points

Supervision I: The supervisory relationships in this case were confusing. The (second-year) junior resident regarded the chief medical resident as his immediate supervisor. With a private patient, however, the chain of command also included the senior medical resident as well as the patient's attending cardiologist (the chief medical resident was not necessarily involved). The attending cardiologist had a third-year cardiology fellow as an assistant. Since the patient was on a what was considered a cardiac step-down unit, patients admitted were assigned to the junior medical resident on-call.

A cross-discipline, nebulous supervisory structure and not-so-subtle prohibitions against disturbing senior staff at night places extraordinary burdens on junior staff. Make the lines and protocols of supervisory responsibility clear to all caregivers.

Supervision II: This case highlights the decision point between seeking supervisory consultation and placing the welfare of the patient at risk. The resident's first documented call for assistance (to the cardiology fellow) was several hours after he was called by the nurse. He waited another hour to phone the attending.

Clinical judgment rarely exists in a vacuum and knowing when to call for assistance is critical for all providers. Apart from medical knowledge, judgment is derived both from personal maturity and clinical experience. This may be the one area where house officers and nurses require the most thorough appraisal of their readiness to be placed in positions where recognition of developing crises is paramount. This, coupled with supervisory appreciation of the necessary wisdom and willingness to seek consultation, may help avoid sink-or-swim expectations. When the patient's care is potentially compromised, revealing one's insecurities to a supervisor is the safer course.

Supervision III: The resident in this case felt capable of managing the patient's care and confident that his management was proper.

Achieving the balance between resident supervision and autonomous experience is a constant challenge in physician training. Supervision adequate to enhance the quality of patient care requires that the degree of autonomous resident functioning is appropriately assessed, supervisory physicians are readily available to evaluate and support resident care decisions, and residents can recognize when assistance is needed and feel comfortable seeking this help.

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