Infection Control in the Dental Office: Compliance Revisited

Self-examination is the first step to ensuring safety

Marie T. Fluent, DDS

One may look at the most recent breach of infection control within the oral surgery clinic in Tulsa, Oklahoma, and merely shake one’s head. This facility has exposed as many as 7000 patients to HIV, hepatitis B, and hepatitis C over a 6-year period. Of the patients who received treatment at this clinic and were tested for blood-borne pathogens, 74 tested positive for hepatitis C, five for hepatitis B, and three for HIV as of June 20, 2013.

Inspections by the Oklahoma Board of Dentistry reported numerous violations of infection control protocols in this facility, including unsanitary and unsafe conditions, improper dispensing of medications, and illegal administration of intravenous sedation by dental assistants. This news story created media hype, stirred state and national dental board awareness, generated panic among patients of this clinic, and increased patient concerns throughout the country.

It is tempting to simply be outraged at this doctor and his staff for infection control noncompliance and inattention to infection control protocol within the office. How dare they put patients at risk and shed such a negative light on the practice of dentistry? We must ask ourselves, how could this happen? How could an office so blatantly ignore our profession’s infection control protocol (Centers for Disease Control and Prevention [CDC] guidelines and Occupational Safety and Health Administration [OSHA] regulations) and drastically lean toward non-compliance and negligence?

Unfortunately, it often requires an incident of this sort and magnitude to bring the importance of infection control back to the forefront of our priority list. Fortunately, this is likely an isolated event; the vast majority of dentists are diligent, compliant, and follow proper protocols within their dental practices. This case serves as a dramatic reminder, however, that although infection transmission rarely occurs in the dental setting, when it does, the consequences may be severe, highly publicized, and possibly lethal.

As a busy practice owner, I acknowledge that it is easy to become inattentive and allow compliance to wane. Other, more pressing tasks and concerns fill our days. In addition to treating patients, we must attend to the business of dentistry, market our practices, stay current in our field, and manage our staffs. Our to-do list seems endless, and attention to infection control protocol may feel like one more chore to which we must attend. Unlike other tasks of office ownership, the practice of safe dentistry is not glamorous, it is not revenue producing, and the fruits from our efforts are not immediately evident. Thus, compliance may easily slip from our priority list.

National media hype and attention has brought the importance of infection control in the dental setting to the minds of our patients. They have been educated to look for general cleanliness, a neat and decluttered instrument processing area, and clinical personnel washing hands and donning gloves. As clinicians and dental team members, we know that successful implementation of infection control program is much more involved and complicated than what a patient may observe. The safe practice of dentistry involves leadership, staff education, knowledge of and adherence to protocol and regulations, constant attention, and a continuous strive for compliance.

The CDC recommends and OSHA mandates that dental health care personnel receive infection control training upon initial assignment, when new tasks...
may affect their exposure risks, and, at a minimum, annually. The occurrence of this Tulsa incident serves as a reminder that now is an opportune time to re-evaluate the protocol within our dental facilities. As we reflect on our safe practice of dentistry, we may consider the following: Are our dental teams adequately educated and current with regard to infection control guidelines and regulations? Have we created a collaborative atmosphere where infection prevention is a team-based responsibility? Are clinical personnel attentive, diligent, and striving for compliance?

A self-audit checklist is a comprehensive and systematic method to evaluate infection control protocol within our clinics. It serves as a useful aid to quickly evaluate our practices and ensure that they are within the standard of care. Such a list may ask pertinent questions in the key areas of any successful program. The administration of the office-specific program and a review of blood-borne pathogens and how they are transmitted should first be addressed. Other topics to be included are hand hygiene, personal protective equipment, disinfection and sterilization of patient care items, and the cleaning and disinfection of environmental surfaces and dental unit waterlines. Special considerations that are pertinent to specific facilities may also include maintenance of dental handpieces, administration of parenteral medications, and infection control considerations for surgical procedures and the dental laboratory.

Although this list is not intended to be all-inclusive or guarantee that our offices are OSHA compliant, it serves as a useful tool to highlight areas where infection control protocol may be weak and necessitate further attention, education, and training. Clinicians may address specific topics in greater depth through the additional resources provided.

Hopefully, we have all learned a great lesson from this incident. Implementation of and compliance to an infection control program are not optional in the practice of dentistry. It is our responsibility to maintain a safe environment for our patients, our staff, and ourselves. Effective infection prevention is a team-based responsibility requiring continuous education, attention, diligence, and a constant strive for compliance.

It is in the best interest of every dental practice to make sure that employee safety training is up to date at least annually. This brief review of infection control policies and protocol may allow a clinical staff an opportunity to clarify and address infection control weaknesses within their practice. We should be proud of the care we provide to our patients and have confidence that we do so in a safe manner.

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NOTES
Self-audit Checklist for Infection Control

Dental Infection Control Program Administration
Y N Are “standard precautions” followed for all patients?
Y N Is there a written infection control program?
Y N Does the office have an IC and OSHA coordinator assigned?
Y N Have all personnel received training regarding infectious agents?
Y N Does the office routinely evaluate the office infection control program?

Preventing Transmission of Bloodborne Pathogens
Y N Is the HBV vaccination offered and records kept?
Y N Are sharps containers and needle recapping devices available?
Y N Is there a “needle stick” protocol and post-exposure program?

Hand Hygiene
Y N Do clinic personnel perform hand hygiene before and after treating patients?
Y N Are alcohol hand rubs available?
Y N Are products available for hand hygiene manufactured for health care providers?
Y N Are appropriate hand lotions available to prevent skin disorders?

Contact Dermatitis and Latex Sensitivity
Y N Are latex-free items available for patients and clinic personnel?
Y N Are clinic personnel made aware of latex sensitivity and consequences?

Personal Protective Equipment
Y N Do clinic personnel wear appropriate eye protection?
Y N Do clinic personnel change masks between patients?
Y N Do clinic personnel wear protective clothing and change when necessary?
Y N Is protective clothing removed before leaving office?
Y N Are gloves appropriate to treatment available in sizes required?
Y N Are gloves changed between patients?

Sterilization and Disinfection of Patient-Care Items
Y N Is there a central instrument processing area available for the office?
Y N Are the manufacturer’s guidelines followed for sterilizer maintenance?
Y N Have clinical personnel received training on how to use the equipment?
Y N Are visible blood and debris removed from instruments prior to sterilization?
Y N If hand scrubbing is performed, is a long-handled brush utilized and utility gloves worn?
Y N If instrument cleaning via ultrasonic is performed, are proper enzymatic cleaners used?
Y N Are heavy-duty utility gloves provided for instrument cleaning?
Y N Are instruments wrapped appropriately before sterilization?
Y N Is sterilization equipment properly monitored and records maintained?
Y N Are all wrapped instrument packages inspected to ensure they are intact?
Y N Are all implantable devices sterilized before use?

Environmental Infection Control
Y N Are clinical contact surfaces disinfected or barrier protected for each patient?
Y N Are surface barriers changed between patients?
Y N Are appropriate products utilized for cleaning and disinfecting clinical contact areas?
<table>
<thead>
<tr>
<th>Question</th>
<th>Y</th>
<th>N</th>
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<tbody>
<tr>
<td>Do clinic personnel use PPE when cleaning environmental surfaces?</td>
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<td>Are housekeeping surfaces cleaned on a routine basis?</td>
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<td><strong>Dental Unit Waterlines</strong></td>
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<td>Does the dental unit water meet EPA regulatory standards for drinking water?</td>
<td>Y</td>
<td>N</td>
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<td>Have the manufacturers’ recommended guidelines been followed?</td>
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<tr>
<td>Is the water flushed (handpieces, ultrasonic scalers, and air/water syringes) for 20-30 seconds after each patient?</td>
<td>Y</td>
<td>N</td>
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<tr>
<td><strong>Dental Handpieces</strong></td>
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<td>Are handpieces cleaned, disinfected, lubricated, and sterilized between patients?</td>
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<td><strong>Parenteral Medications</strong></td>
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<td>Are single-dose medications and devices used for one patient only and disposed of appropriately?</td>
<td>Y</td>
<td>N</td>
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<td><strong>Oral Surgical Procedures</strong></td>
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<td>Do clinical personnel wear sterile surgeon’s gloves and use sterile irrigation?</td>
<td>Y</td>
<td>N</td>
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<td>Is sterile water (or saline) used for invasive procedures?</td>
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<td>Are biopsy specimens placed in a sturdy, leakproof container with proper labels?</td>
<td>Y</td>
<td>N</td>
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<td>Are extracted teeth disposed of as a regulated medical waste or returned to the patient?</td>
<td>Y</td>
<td>N</td>
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<tr>
<td><strong>Dental Laboratory</strong></td>
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<td>Are clinical personnel using PPE when handling items received in the laboratory?</td>
<td>Y</td>
<td>N</td>
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<td>Are impressions disinfected prior to being transported to the lab and communicated as such?</td>
<td>Y</td>
<td>N</td>
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This self-audit checklist was developed by Marie T. Fluent, DDS.