



## Menu of Strategies to Prevent *Clostridium difficile* Infections

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### PREPARED BY

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Facility Name \_\_\_\_\_

Date: \_\_\_\_\_

This tool is intended to help you assess your facility’s current practices for preventing *Clostridium difficile* infections (CDI) and identify areas for creating a plan of action. Indicate whether your facility has effectively adopted the following change strategies and if action is needed for improvement. The list is not exhaustive—antimicrobial stewardship is a key component of CDI prevention not addressed in this tool—or in priority order and strategies should be based on facility-specific risks. You can write in other strategies on the blank lines.

1. Early and reliable <u>detection</u> of CDI: lab testing and diagnosis		Effectively adopted	Action needed	Not ready to address
<b>Questions to address (examples)</b>	<ul style="list-style-type: none"> <li>• How are patients/residents with CDI identified?</li> <li>• When should a C. diff test be ordered and which staff can initiate this?</li> <li>• How should a stool sample be sent and how many stools should be sent?</li> <li>• How quickly/when does the test result come back? How and to whom is the test result communicated?</li> <li>• Do staff know how to interpret the test result? (Do they know the type of test used and the sensitivity of that test?)</li> </ul>			
<b>Change strategies (examples)</b>	• Educate staff, patients, and family about CDI and prevention strategies			
	• Improve quality of documentation of diarrheal stools (e.g., using a standard tool that captures consistency & frequency)			
	• Educate staff on testing for CDI and type of test used at facility			
	• Implement standing orders that empower nurses to order CDI test when criteria are met			
	• Establish lab policy to discourage inappropriate testing (e.g., reject formed stool samples and, if nucleic acid amplification testing methods like PCR is used, lock out repeat testing for 7 days after first test)			
	• Implement a process to presumptively isolate symptomatic patients in Contact Precautions as soon as CDI is suspected			
	• Collect and send unformed stool (i.e., conforming to shape of container) in a timely fashion, ensuring appropriate refrigeration and handling			
	• Implement a lab-based alert system to ensure immediate communication of test results			
	• Provide staff with regular feedback on facility’s CDI laboratory positivity rate (# of positive tests/# of tests submitted) and timeliness of diagnosis			
	• Provide staff with regular feedback on facility’s CDI incidence and prevalence rates			
<b>Measurement (examples)</b>	• Time from documentation of third diarrheal stool to time of initiation of Contact Precautions			
	• Time from documentation of third diarrheal stool to time of communication of test results			
	• Facility/unit CDI laboratory positivity rate (# of positive tests/# of tests submitted)			
	• Staff knowledge of CDI symptoms, when and how to order CDI test, and interpretation of test results			



2. Early and appropriate <u>containment</u> of CDI: safe and non-restrictive implementation of Contact Precautions		Effectively adopted	Action needed	Not ready to address
Questions to address (examples)	<ul style="list-style-type: none"> <li>When and how should Contact Precautions be initiated?</li> <li>If the resident/patient with (suspected) CDI has a roommate, how does this affect toileting (e.g., who should use the bedside commode)?</li> <li>When and how should Contact Precautions be discontinued?</li> </ul>			
Change strategies (examples)	<ul style="list-style-type: none"> <li>Consider linking an isolation reminder alert to CDI test orders</li> </ul>			
	<ul style="list-style-type: none"> <li>Implement a process to presumptively isolate symptomatic patients until <i>C. diff</i> (or other contagious source of) infection is reasonably ruled out</li> </ul>			
	<ul style="list-style-type: none"> <li>Implement a gradient of preferences for cohorting:               <ol style="list-style-type: none"> <li>(1) Single room with preference for incontinent patients;</li> <li>(2) Cohort CDI patient with another CDI patient;</li> <li>(3) Cohort CDI patient with a patient at low risk for acquiring CDI (e.g., non-immunocompromised with no recent antimicrobial treatment. The non-CDI patient should use bedside commode)</li> </ol> </li> </ul>			
	<ul style="list-style-type: none"> <li>Ensure adequate supplies of personal protective equipment (PPE) are readily accessible to staff at all times</li> </ul>			
	<ul style="list-style-type: none"> <li>Continue Contact Precautions for beyond duration of diarrhea (minimum 3 days)</li> </ul>			
	<ul style="list-style-type: none"> <li>Use visual cues to notify staff and visitors to use Contact Precautions</li> </ul>			
	<ul style="list-style-type: none"> <li>Educate staff and visitors on use of PPE and hand hygiene</li> </ul>			
	<ul style="list-style-type: none"> <li>In outbreak situations, or when facility-specific risks or barriers to successful CDI prevention are identified, consider promoting the use of soap and water for hand hygiene before exiting room of a patient with CDI*</li> </ul>			
	<ul style="list-style-type: none"> <li>Engage unit champion to support consistent application of Contact Precautions</li> </ul>			
	<ul style="list-style-type: none"> <li>Monitor compliance with Contact Precautions and provide immediate one-on-one feedback</li> </ul>			
Measurement (examples)	<ul style="list-style-type: none"> <li>Staff compliance with Contact Precautions</li> </ul>			
	<ul style="list-style-type: none"> <li>Time from documentation of third diarrheal stool to time of initiation of Contact Precautions</li> </ul>			
	<ul style="list-style-type: none"> <li>Time from documentation of last diarrheal stool to time of discontinuation of Contact Precautions</li> </ul>			

**\*Non-outbreak settings:** According to the Centers for Disease Control and Prevention (CDC), “preventing contamination of the hands via glove use remains the cornerstone for preventing CDI transmission via the hands of healthcare workers; any theoretical benefit from instituting soap and water must be balanced against the potential for decreased compliance resulting from a more complex hand hygiene message.” [http://www.cdc.gov/HAI/organisms/cdiff/Cdiff\\_faqs\\_HCP.html](http://www.cdc.gov/HAI/organisms/cdiff/Cdiff_faqs_HCP.html)

**Outbreak settings:** Alcohol hand hygiene products do not kill *C. diff* spores. Therefore expert opinion is that soap and water be preferentially used in outbreak settings because of the possibility that increased hand contamination and/or noncompliance with glove use is an issue.



3. <u>Cleaning and disinfection of environment and equipment</u>		Effectively adopted	Action needed	Not ready to address
<b>Questions to address (examples)</b>	<ul style="list-style-type: none"> <li>Do staff know the difference between cleaning and disinfection?</li> <li>Who cleans and disinfects what? What do they clean and disinfect it with? How do they clean and disinfect it?</li> <li>How are shared spaces cleaned? (E.g., physical therapy room, beauty parlor, activity room, dining room)</li> <li>How is shared equipment cleaned (e.g., lifts, blood pressure cuffs, thermometer)?</li> </ul>			
<b>Change strategies (examples)</b>	• Use dedicated equipment for CDI patients/residents when possible			
	• Develop a policy for daily and terminal cleaning and disinfection of rooms occupied by patients/residents with CDI			
	• Clearly designate responsibilities of “who cleans and disinfects what”			
	• Educate staff on high-touch surfaces and on materials and methods for cleaning and disinfection			
	• Use an EPA-registered sporicidal* (e.g., sodium hypochlorite [bleach] solution) for environmental disinfection, minimally at discharge or transfer of patient with CDI. Consider daily cleaning of room for a resident with active CDI.			
	• Provide regular, non-punitive feedback to staff on adherence to and adequacy of cleaning and disinfection			
<b>Measurement (examples)</b>	• Cleaning and disinfection <u>practice</u> as assessed by using fluorescent gel**			
	• Cleaning and disinfection <u>practice</u> as assessed by covertly observing staff performance**			

\* See “List K: EPA’s Registered Antimicrobial Products Effective against *Clostridium difficile* Spores” available at [http://www.epa.gov/oppad001/list\\_k\\_clostridium.pdf](http://www.epa.gov/oppad001/list_k_clostridium.pdf). Publication date: August 17, 2012.

\*\* The CDC Environmental Checklist for Monitoring Terminal Cleaning or similar monitoring tool can be used to ensure assessment of high touch room surfaces.



4. Inter-facility patient transfer		Effectively adopted	Action needed	Not ready to address
<b>Questions to address (examples)</b>	<ul style="list-style-type: none"> <li>• What critical pieces of information need to be communicated during patient transfer?</li> <li>• At time of transfer, do you provide information on known history of acute or recurrent CDI within the last 12 weeks?</li> <li>• What process do you use to notify the receiving healthcare facility before patient transfer?</li> <li>• When should Contact Precautions be recommended to or initiated by a receiving facility?</li> <li>• Do your policies reflect that requesting a negative stool test before accepting a patient with a history of CDI, or “test of cure,” is against current recommendations?</li> </ul>			
<b>Change strategies (examples)</b>	<ul style="list-style-type: none"> <li>• Initiate a conversation/collaborative project with the facility you frequently share patients/residents with to address ways to improve communication and care coordination</li> </ul>			
	<ul style="list-style-type: none"> <li>• Implement the CDC Inter-facility Infection Control Transfer Form or similar communication tool to ensure critical information about patient’s CDI status/treatment (and other infections) is communicated at time of transfer</li> </ul>			
<b>Measurement (examples)</b>	<ul style="list-style-type: none"> <li>• Frequency of use of CDC Inter-facility Infection Control Transfer Form or similar communication tool for CDI patients</li> </ul>			
	<ul style="list-style-type: none"> <li>• Hospital readmissions for CDI</li> </ul>			



## RESOURCES

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