



November 2, 2016

**POSITION STATEMENT:** New Bleach Concentration Instructions

**PURSUANT TO:** Rules Governing the Sanitation of Child Care Centers 15A NCAC 18A .2800

**SOURCE:** Children’s Environmental Health  
NC Department of Health and Human Services  
Division of Public Health

**ISSUE:** Instructions for compliance with the generic mixing solution for disinfection and the mixing solution for sanitizing as specified in Rule .2801(7) and (22) have changed.

**Question:**

Do the mixing specifications as directed in rules .2801(7) and .2801(22) apply to the new readily available household bleach concentrations such as the 8.25% sodium hypochlorite solution?

Answer: No

**DISCUSSION AND RATIONAL:**

The concentrations of chlorine in readily available household bleach have changed. Currently, one of the most commonly available bleach solutions is **8.25% sodium hypochlorite solution**. It should be noted that mixing instructions provided in the child care sanitation rules were based on bleach concentrations of 5.25% and 6% of sodium hypochlorite solution. Because of the new standards for household bleach, it is necessary to provide new mixing guidelines for the newer bleach concentrations.

**RESPONSE / INTERPRETATION:**

The following is provided as added guidance to assure compliance with the recommended mixing instructions provided in Rules .2801(7) and .2801(22). It is also recommended that child care providers be instructed to read bleach container labels carefully to verify the sodium hypochlorite concentration and to use the following table as a guide for mixing bleach.





## Bleach Sanitizing and Disinfection Solution Preparation Instructions

The requirement to mix a fresh solution of sanitizer and disinfectant daily is required when bleach is used as the method for sanitizing and disinfecting. This chart is provided to reflect the mixing of the various strengths of household bleach solutions.

### BLEACH SOLUTION MIXING GUIDELINE

Concentration (%) of sodium hypochlorite can be found on the bleach container label

APPLICATION	Bleach Per Gallon of Water	Bleach Per Quart of Water	Bleach (Free Chlorine Concentration)	Recommended Labeling
<b>5.25 % Sodium Hypochlorite</b>				
<b>Disinfecting Strength</b>	¼ Cup	1 Tablespoon	<b>500 -- 800 ppm</b>	Disinfectant
<b>Sanitizing Strength</b>	1 tablespoon	¾ Teaspoon	<b>50 -- 200 ppm</b>	Sanitizer
<b>6.00 % Sodium Hypochlorite</b>				
<b>Disinfecting Strength</b>	3 ½ Tablespoons	2 ½ Teaspoons	<b>500 -- 800 ppm</b>	Disinfectant
<b>Sanitizing Strength</b>	2 ½ Teaspoons	¼ tablespoon	<b>50 -- 200 ppm</b>	Sanitizer
<b>8.25 % Sodium Hypochlorite</b>				
<b>Disinfecting Strength</b>	2 ½ Tablespoon	2 Teaspoon	<b>500 – 800 ppm</b>	Disinfectant
<b>Sanitizing Strength</b>	2 Teaspoon	½ Teaspoon	<b>50 -- 200 ppm</b>	Sanitizer

**Note: Always test solutions after mixing to assure that the proper concentrations are achieved for the prescribed application.**

#### REFERANCES:

2014 National Resource Center for Health and Safety in Child Care Early Education  
Industrial Test Systems, Inc (ITS)  
Rules Governing the Sanitation of Child Care Centers 15A NCAC 18A .2800

*NOTE: Position statements are policy documents to clarify how to interpret or enforce a law or rule. They are not enforceable on their own, but are intended to promote uniform interpretation and enforcement of the underlying law or rule.*

