

## Procedure Checklist FM 5-501 Water Cementitious Ratio

		P	F	N/A
<b>Item</b>				
1.	A website (app) may be used to determine the water/cementitious ratio in lieu of the instructions in FM 5-501. The website (app) must be initially verified by comparing the results from the website (app) with calculation from FM 5-501.			
2.	If using a website (app), proceed to step 11.			
3.	SSD weight of the coarse aggregate was calculated by dividing the total weight of the coarse aggregate by the percentage of free water (expressed as a decimal) plus 1.00 for the coarse aggregate.			
4.	SSD weight for the coarse aggregate was subtracted from the total weight of the coarse aggregate to obtain the weight of free water on the coarse aggregate. (Rounded to three significant digits)			
5.	SSD weight of the fine aggregate was calculated by dividing the total weight of the fine aggregate by the percentage of free water (expressed as a decimal) plus 1.00 for the fine aggregate.			
6.	SSD weight for the fine aggregate was subtracted from the total weight of the fine aggregate to obtain the weight of free water on the fine aggregate. (Rounded to three significant digits)			
7.	The weight of batch water was obtained. If the batch water was expressed in gallons, then the amount was multiplied by 8.33. (Rounded to three places)			
8.	The weight of water added at the jobsite was obtained. If the jobsite water was expressed in gallons, then the amount was multiplied by 8.33 (Rounded to three places)			
9.	The total weight of water in the concrete was calculated by adding weight of free water on coarse aggregate, fine aggregate, and batch water and water added at the job site.			
10.	The total weight of cementitious material was calculated by adding the weight of cement to the following materials as applicable: blast furnace slag, fly ash, metakaolin and silica fume.			
11.	The water/cementitious ratio for the concrete mix was calculated by dividing the total weight of water by the cementitious material (Rounded to two significant digits)			
12.	The water/cementitious ratio for the concrete mix design was calculated within 10 minutes, prior to placement of the load.			

**Remarks:** **Comparison Criteria: NO DIFFERENCE**

Date: \_\_\_\_\_ Technician: \_\_\_\_\_ IA Observer: \_\_\_\_\_

Technician's E-mail Address: \_\_\_\_\_

Employer's/ Supervisor's E-mail Address: \_\_\_\_\_