



Dave Heineman
Governor

State of Nebraska

DEPARTMENT OF AGRICULTURE
GREGORY A. IBACH
Director

Nebraska Standards Laboratory
3721 West Cuming Street
Lincoln, NE 68524

CERTIFICATION FOR STANDARDS OF MEASUREMENT

Agency: Food Safety & Consumer Protection
Area 30

Date: 3/26/2012
Agency ID: 30
NE Cert No: 20120040
P.O. No:

Submitted By: Jeff Saathoff

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<u>Denomination</u>	<u>Serial Number</u>	<u>Weight Number</u>	<u>Tolerance</u>	<u>Accept/Reject</u>
5 gal	00-16623-01	1	VL	A
5 gal	00-16623-02	1	VL	A
5 gal	00-16623-03	1	VL	A
5 gal	40702C	1	VL	A
5 gal	40702D	1	VL	A
4 kg	6	1	4	A
2 lb	7A73	1	F	A
2 lb	7A73	2	F	A
2 lb	7A73	3	F	A
2 lb	7A73	4	F	A
2 lb	7A73	5	F	A
2 lb	7A73	6	F	A
2 lb	7A73	7	F	A
2 lb	7A73	8	F	A
2 lb	7A73	9	F	A
2 lb	7A73	10	F	A
2 lb	7A73	11	F	A
2 lb	7A73	12	F	A
2 lb	7A73	13	F	A
2 lb	7A73	14	F	A
1 lb	7A73	15	F	A
1 lb	7A73	16	F	A
8 oz	7A73	17	F	A
4 oz	7A73	18	F	A
2 oz	7A73	19	F	A

Department of Agriculture, 301 Centennial Mall South
Web Site: www.agr.ne.gov

Administration
P.O. Box 94947
Lincoln, NE 68509-4947
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Lincoln, NE 68502-5399
(402) 471-2176
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Bureau of Animal Industry
P.O. Box 94987
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(402) 471-2351
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Bureau of Dairies & Foods
P.O. Box 95064
Lincoln, NE 68509-5064
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Bureau of Plant Industry
P.O. Box 94956
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Weights and Measures
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Lincoln, NE 68509-4757
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<u>Denomination</u>	<u>Serial Number</u>	<u>Weight Number</u>	<u>Tolerance</u>	<u>Accept/Reject</u>
1 oz	7A73	20	F	A
0.5 oz	7A73	21	F	A
0.25 oz	7A73	22	F	A
0.125 oz	7A73	23	F	A
0.0625 oz	7A73	24	F	A
0.0625 oz*	7A73	25	F	A
0.3 lb	9-OPI-5	14	F	A
0.2 lb	9-OPI-5	15	F	A
0.1 lb	9-OPI-5	16	F	A
0.05 lb	9-OPI-5	17	F	A
0.03 lb	9-OPI-5	18	F	A
0.02 lb	9-OPI-5	19	F	A
0.01 lb	9-OPI-5	20	F	A
0.005 lb	9-OPI-5	21	F	A
0.003 lb	9-OPI-5	22	F	A
0.002 lb	9-OPI-5	23	F	A
0.001 lb	9-OPI-5	24	F	A
0.001 lb*	9-OPI-5	25	F	A
25 lb	WM25-132	1	F	A
25 lb	WM25-133	1	F	A
25 lb	WM25-135	1	F	A
25 lb	WM25-136	1	F	A
25 lb	WM25-137	1	F	A
25 lb	WM25-138	1	F	A
25 lb	WM25-139	1	F	A
25 lb	WM25-140	1	F	A
25 lb	WM25-22	1	F	A
25 lb	WM25-26	1	F	A
25 lb	WM25-31	1	F	A
25 lb	WM25-34	1	F	A
25 lb	WM25-35	1	F	A
25 lb	WM25-41	1	F	A
25 lb	WM25-54	1	F	A
25 lb	WM25-60	1	F	A
25 lb	WM25-61	1	F	A
25 lb	WM25-62	1	F	A

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Denomination	Serial Number	Weight Number	Tolerance	Accept/Reject
25 lb	WM25-63	1	F	A
25 lb	WM25-64	1	F	A
300 g	WM-G89-2	1	4	A
200 g	WM-G89-2	2	4	A
100 g	WM-G89-2	3	4	A
50 g	WM-G89-2	4	4	A
30 g	WM-G89-2	5	4	A
20 g	WM-G89-2	6	4	A
10 g	WM-G89-2	7	4	A
5 g	WM-G89-2	8	4	A
3 g	WM-G89-2	9	4	A
2 g	WM-G89-2	10	4	A
1 g	WM-G89-2	11	4	A
500 mg	WM-G89-2	12	4	A
200 mg	WM-G89-2	13	4	A
200 mg*	WM-G89-2	14	4	A
100 mg	WM-G89-2	15	4	A
50 mg	WM-G89-2	16	4	A
20 mg	WM-G89-2	17	4	A
20 mg*	WM-G89-2	18	4	A
10 mg	WM-G89-2	19	4	A
5 mg	WM-G89-2	20	4	A
2 mg	WM-G89-2	21	4	A
2 mg*	WM-G89-2	22	4	A
1 mg	WM-G89-2	23	4	A

These field standards have been compared with our reference standards and found to be within the tolerances for their class, or condemned, as prescribed by the National Institute of Standards and Technology. These field standards also meet the required specifications.

The reference standards used are traceable to the National Institute of Standards and Technology (NIST). Our traceability is maintained through control charts, regional inter-comparisons and periodic recertifications. This certificate is issued by the Nebraska Department of Agriculture / Division of Weights and Measures. Reproduction of this certificate must include the entire document (including all attached papers).

See 'Test Results' attached

See report/letter attached



Craig E. Olsen
Nebraska State Metrologist

Nebraska Standards Laboratory
3721 West Cuming Street
Lincoln, NE 68524
(402) 471-2087

SOP 4 - Double Substitution - Summary Of Test Results

Agency ID: 30
Agency: Food Safety & Consumer Protection
Area 30

NE Cert No: 20120040
Date: 3/26/2012
P.O. No:
Observer: CEO

Form No.: NE04LF7-R00

Submitted By: Jeff Saathoff

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Denom.	Serial Number	Wt. No.	True Mass (g)	Conventional Mass (g)	Uncertainty (g)	Comparator used	Standard used
300 g	WM-G89-2	1	300.00353407	300.00261556	0.00014956	CC1201 / 1 kg	300gd
200 g	WM-G89-2	2	200.00138460	200.00077226	0.00014876	CC1201 / 1 kg	200gd
100 g	WM-G89-2	3	100.00182054	100.00151437	0.00006137	AT106_100G	100grl
50 g	WM-G89-2	4	50.00042008	50.00026699	0.00003825	AT106_50G	50grl
30 g	WM-G89-2	5	30.00069843	30.00060658	0.00003053	AT106_50G	30grl
20 g	WM-G89-2	6	20.00032440	20.00026317	0.00002187	AT106_20G	20grl
10 g	WM-G89-2	7	10.00043748	10.00040686	0.00001808	AT106_10G	10grl
5 g	WM-G89-2	8	5.00020995	5.00019464	0.00000721	CCE6_5G	5grl
3 g	WM-G89-2	9	3.00003041	3.00002122	0.00000632	CCE6_5G	3grl
2 g	WM-G89-2	10	2.00005923	2.00005310	0.00000632	CCE6_5G	2grl
1 g	WM-G89-2	11	1.00001569	1.00001262	0.00000355	CCE6_1G	1grl
500 mg	WM-G89-2	12	0.49998714	0.49998561	0.00000271	CCE6_1G	500mgrl
200 mg	WM-G89-2	13	0.19998696	0.19998634	0.00000235	CCE6_1G	200mgrl
200 mg*	WM-G89-2	14	0.19998030	0.19997969	0.00000235	CCE6_1G	200mgrl
100 mg	WM-G89-2	15	0.09992818	0.09992788	0.00000209	CCE6_100MG	100mgrl
50 mg	WM-G89-2	16	0.04999151	0.04999136	0.00000208	CCE6_100MG	50mgrl
20 mg	WM-G89-2	17	0.02002580	0.02001990	0.00000205	CCE6_100MG	20mgrl
20 mg*	WM-G89-2	18	0.02004345	0.02003755	0.00000205	CCE6_100MG	20mgrl
10 mg	WM-G89-2	19	0.00999576	0.00999282	0.00000205	CCE6_10MG	10mgrl
5 mg	WM-G89-2	20	0.00500076	0.00499929	0.00000204	CCE6_10MG	5mgrl

Due to handling, storage and/or environmental factors, the reported values are valid only while test items are within our control. No calibration periods or intervals are given with this report. We can not guarantee accuracy of results beyond the controls of our laboratory.

True Mass is the mass value in a vacuum. Conventional Mass is the mass value in a normal air environment. All values are "as found" unless stated differently in an attachment to the certification.

The uncertainty of measurement is determined using the uncertainty of the reference standard(s), standard deviation of the process, environmental factors and bias using a RSS calculation. Uncertainty values are calculated using a K factor of 2.

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3721 West Cuming Street
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SOP 4 - Double Substitution - Summary Of Test Results

Agency ID: 30
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, -

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Denom.	Serial Number	Wt. No.	True Mass (g)	Conventional Mass (g)	Uncertainty (g)	Comparator used	Standard used
2 mg	WM-G89-2	21	0.00200764	0.00200705	0.00000204	CCE6_10MG	2mgrl
2 mg*	WM-G89-2	22	0.00201684	0.00201625	0.00000204	CCE6_10MG	2mgrl
1 mg	WM-G89-2	23	0.00099689	0.00099660	0.00000203	CCE6_10MG	1mgrl

Due to handling, storage and/or environmental factors, the reported values are valid only while test items are within our control. No calibration periods or intervals are given with this report. We can not guarantee accuracy of results beyond the controls of our laboratory.

True Mass is the mass value in a vacuum. Conventional Mass is the mass value in a normal air environment. All values are "as found" unless stated differently in an attachment to the certification.

The uncertainty of measurement is determined using the uncertainty of the reference standard(s), standard deviation of the process, environmental factors and bias using a RSS calculation. Uncertainty values are calculated using a K factor of 2.

Nebraska Standards Laboratory
3721 West Cuming Street
Lincoln, NE 68524
(402) 471-2087

SOP 8 - Modified Substitution Test Results

Form No.: NE04LF9-R00

Agency ID: 30
 Agency: Food Safety & Consumer Protection
 Area 30
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NE Cert No: 20120040
 Date: 3/26/2012
 P.O. No:
 Observer: CEO

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Serial Number	Wt. No.	Retest No.	Denom.	Comparator used	Standard Used	Error of test weight	Tolerance	Uncertainty	Accepted or Rejected
6	1	0	4 kg	CC10000S_5kg	4kg	-0.0064918 g	0.08 g	0.0007868 g	A
7A73	1	0	2 lb	CC1201_2 lb	NSL-2-1	0.0134043 g	0.091 g	0.0022576 g	A
7A73	2	0	2 lb	CC1201_2 lb	NSL-2-1	0.0438043 g	0.091 g	0.0022576 g	A
7A73	3	0	2 lb	CC1201_2 lb	NSL-2-1	-0.0640957 g	0.091 g	0.0022576 g	A
7A73	4	0	2 lb	CC1201_2 lb	NSL-2-1	0.0066043 g	0.091 g	0.0022576 g	A
7A73	5	0	2 lb	CC1201_2 lb	NSL-2-1	-0.0870957 g	0.091 g	0.0022576 g	A
7A73	6	0	2 lb	CC1201_2 lb	NSL-2-1	-0.0414957 g	0.091 g	0.0022576 g	A
7A73	7	0	2 lb	CC1201_2 lb	NSL-2-1	0.0255043 g	0.091 g	0.0022576 g	A
7A73	8	0	2 lb	CC1201_2 lb	NSL-2-1	0.0491043 g	0.091 g	0.0022576 g	A
7A73	9	0	2 lb	CC1201_2 lb	NSL-2-1	-0.0740957 g	0.091 g	0.0022576 g	A
7A73	10	0	2 lb	CC1201_2 lb	NSL-2-1	0.0742043 g	0.091 g	0.0022576 g	A
7A73	11	0	2 lb	CC1201_2 lb	NSL-2-1	0.0749043 g	0.091 g	0.0022576 g	A
7A73	12	0	2 lb	CC1201_2 lb	NSL-2-1	-0.0177957 g	0.091 g	0.0022576 g	A
7A73	13	0	2 lb	CC1201_2 lb	NSL-2-1	0.0426043 g	0.091 g	0.0022576 g	A
7A73	14	0	2 lb	CC1201_2 lb	NSL-2-1	-0.0764957 g	0.091 g	0.0022576 g	A
7A73	15	0	1 lb	CC1201_1 lb	NSL-1-1	-0.0410727 g	0.07 g	0.0004510 g	A
7A73	16	0	1 lb	CC1201_1 lb	NSL-1-1	-0.0401727 g	0.07 g	0.0004510 g	A
7A73	17	0	8 oz	CC1201_8 oz	NSL-8-1	-0.0117671 g	0.045 g	0.0003594 g	A
7A73	18	0	4 oz	CC1201_8 oz	NSL-Z	0.0005960 g	0.023 g	0.0003420 g	A
7A73	19	0	2 oz	AT106_0.2 lb	NSL-Y	0.0007442 g	0.011 g	0.0000637 g	A
7A73	20	0	1 oz	AT106_0.2 lb	2A9-1oz	-0.0051881 g	0.0054 g	0.0003671 g	A
7A73	21	0	0.5 oz	AT106_0.05 lb	2A9-1.2oz	0.0011869 g	0.0028 g	0.0003635 g	A
7A73	22	0	0.25 oz	AT106_0.05 lb	2A9-1.4oz	0.0006555 g	0.0017 g	0.0000237 g	A
7A73	23	0	0.125 oz	CCE6_0.01 lb	2A9-1.8oz	-0.0010338 g	0.0013 g	0.0000092 g	A
7A73	24	0	0.0625 oz	CCE6_0.01 lb	2A9-1.16oz	-0.0003112 g	0.0011 g	0.0000092 g	A
7A73	25	0	0.0625 oz*	CCE6_0.01 lb	2A9-1.16oz	0.0008070 g	0.0011 g	0.0000092 g	A

Retest number - 0 indicates "as received" error / 1 indicates "adjusted to" error

The uncertainty of measurement is determined using the uncertainty of the reference standard(s), standard deviation of the process, environmental factors and bias using a RSS calculation. Uncertainty values are calculated using a K factor of 2.

"As received" values for weights may not be a true "as found" value because these weights could have been cleaned and/or repainted prior to submission to this lab. Due to handling, storage and/or environmental factors; the reported values are valid only while test items are within our control. No calibration period or interval is given with this report. We can not guarantee accuracy of results beyond the controls of our laboratory.

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 Agency: Food Safety & Consumer Protection
 Area 30

NE Cert No: 20120040
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 P.O. No:
 Observer: CEO

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Serial Number	Wt. No.	Retest No.	Denom.	Comparator used	Standard Used	Error of test weight	Tolerance	Uncertainty	Accepted or Rejected
9-OPI-5	14	0	0.3 lb	CC1201_8 oz	NSL-WK1	-0.0021100 g	0.027 g	0.0003482 g	A
9-OPI-5	15	0	0.2 lb	AT106_0.2 lb	NSL-WK2	-0.0073281 g	0.018 g	0.0000666 g	A
9-OPI-5	16	0	0.1 lb	AT106_0.2 lb	NSL-WK3	-0.0092623 g	0.0091 g	0.0000606 g	R
9-OPI-5	16	1	0.1 lb	AT106_0.2 lb	NSL-WK3	-0.0037153 g	0.0091 g	0.0000606 g	A
9-OPI-5	17	0	0.05 lb	AT106_0.05 lb	NSL-WK4	0.0026201 g	0.0045 g	0.0000311 g	A
9-OPI-5	18	0	0.03 lb	AT106_0.05 lb	NSL-WK5	0.0006483 g	0.0027 g	0.0000221 g	A
9-OPI-5	19	0	0.02 lb	AT106_0.05 lb	NSL-WK6	0.0007474 g	0.0018 g	0.0000251 g	A
9-OPI-5	20	0	0.01 lb	CCE6_0.01 lb	NSL-WK7	-0.0003034 g	0.0015 g	0.0000105 g	A
9-OPI-5	21	0	0.005 lb	CCE6_0.01 lb	NSL-WK8	-0.0003829 g	0.0012 g	0.0000092 g	A
9-OPI-5	22	0	0.003 lb	CCE6_0.01 lb	NSL-WK9	-0.0001457 g	0.00099 g	0.0000088 g	A
9-OPI-5	23	0	0.002 lb	CCE6_0.01 lb	NSL-WK10	0.0003092 g	0.00087 g	0.0000082 g	A
9-OPI-5	24	0	0.001 lb	CCE6_0.01 lb	NSL-WK11	-0.0004423 g	0.0007 g	0.0000081 g	A
9-OPI-5	25	0	0.001 lb*	CCE6_0.01 lb	NSL-WK11	0.0000051 g	0.0007 g	0.0000081 g	A
WM25-132	1	0	25 lb	KA30-3_25lb	NSL-25-1	1.0518098 g	1.1 g	0.0343044 g	A
WM25-133	1	0	25 lb	KA30-3_25lb	NSL-25-1	1.1068098 g	1.1 g	0.0343044 g	R
WM25-133	1	1	25 lb	KA30-3_25lb	NSL-25-1	-0.5031902 g	1.1 g	0.0343044 g	A
WM25-135	1	0	25 lb	KA30-3_25lb	NSL-25-1	1.2318098 g	1.1 g	0.0343044 g	R
WM25-135	1	1	25 lb	KA30-3_25lb	NSL-25-1	0.3118098 g	1.1 g	0.0343044 g	A
WM25-136	1	0	25 lb	KA30-3_25lb	NSL-25-1	0.8118098 g	1.1 g	0.0343044 g	A
WM25-137	1	0	25 lb	KA30-3_25lb	NSL-25-1	0.7168098 g	1.1 g	0.0343044 g	A
WM25-138	1	0	25 lb	KA30-3_25lb	NSL-25-1	1.1718098 g	1.1 g	0.0343044 g	R
WM25-138	1	1	25 lb	KA30-3_25lb	NSL-25-1	-0.5031902 g	1.1 g	0.0343044 g	A
WM25-139	1	0	25 lb	KA30-3_25lb	NSL-25-1	0.9218098 g	1.1 g	0.0343044 g	A
WM25-140	1	0	25 lb	KA30-3_25lb	NSL-25-1	1.2218098 g	1.1 g	0.0343044 g	R
WM25-140	1	1	25 lb	KA30-3_25lb	NSL-25-1	0.1468098 g	1.1 g	0.0343044 g	A
WM25-22	1	0	25 lb	KA30-3_25lb	NSL-25-1	-1.2181902 g	1.1 g	0.0343044 g	R
WM25-22	1	1	25 lb	KA30-3_25lb	NSL-25-1	0.1668098 g	1.1 g	0.0343044 g	A
WM25-26	1	0	25 lb	KA30-3_25lb	NSL-25-1	-1.9681902 g	1.1 g	0.0343044 g	R
WM25-26	1	1	25 lb	KA30-3_25lb	NSL-25-1	0.2668098 g	1.1 g	0.0343044 g	A
WM25-31	1	0	25 lb	KA30-3_25lb	NSL-25-1	-1.2481902 g	1.1 g	0.0343044 g	R
WM25-31	1	1	25 lb	KA30-3_25lb	NSL-25-1	-0.0081902 g	1.1 g	0.0343044 g	A
WM25-34	1	0	25 lb	KA30-3_25lb	NSL-25-1	-0.4831902 g	1.1 g	0.0343044 g	A
WM25-35	1	0	25 lb	KA30-3_25lb	NSL-25-1	0.5118098 g	1.1 g	0.0343044 g	A

Retest number - 0 indicates "as received" error / 1 indicates "adjusted to" error

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Agency ID: 30
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Serial Number	Wt. No.	Retest No.	Denom.	Comparator used	Standard Used	Error of test weight	Tolerance	Uncertainty	Accepted or Rejected
WM25-41	1	0	25 lb	KA30-3_25lb	NSL-25-1	1.0868098 g	1.1 g	0.0343044 g	A
WM25-41	1	1	25 lb	KA30-3_25lb	NSL-25-1	0.2018098 g	1.1 g	0.0343044 g	A
WM25-54	1	0	25 lb	KA30-3_25lb	NSL-25-1	-0.3231902 g	1.1 g	0.0343044 g	A
WM25-60	1	0	25 lb	KA30-3_25lb	NSL-25-1	0.6318098 g	1.1 g	0.0343044 g	A
WM25-61	1	0	25 lb	KA30-3_25lb	NSL-25-1	0.8118098 g	1.1 g	0.0343044 g	A
WM25-62	1	0	25 lb	KA30-3_25lb	NSL-25-1	1.1118098 g	1.1 g	0.0343044 g	R
WM25-62	1	1	25 lb	KA30-3_25lb	NSL-25-1	0.1768098 g	1.1 g	0.0343044 g	A
WM25-63	1	0	25 lb	KA30-3_25lb	NSL-25-1	1.3268098 g	1.1 g	0.0343044 g	R
WM25-63	1	1	25 lb	KA30-3_25lb	NSL-25-1	0.4968098 g	1.1 g	0.0343044 g	A
WM25-64	1	0	25 lb	KA30-3_25lb	NSL-25-1	0.7918098 g	1.1 g	0.0343044 g	A

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Nebraska Standards Laboratory
3721 West Cuming Street
Lincoln, NE 68524
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SOP 19 - Volume Transfer Test Results

Agency ID: 30

Agency: Food Safety & Consumer Protection
Area 30

Form No.: NE03LF12-R00

NE Cert No: 20120040

Date: 3/26/2012

P.O. No:

Submitted By: Jeff Saathoff

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Serial #: 00-16623-01
Retest #: 0
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	51.3 °F	0.999632	0 in3

Test Measure Information

Water Temperature: 51.3 °F
Water Density: 0.999632 g/cm³
Scale Reading: -0.25 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0002 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons

Nebraska Standards Laboratory
3721 West Cuming Street
Lincoln, NE 68524
(402) 471-2087

SOP 19 - Volume Transfer Test Results

Agency ID: 30

Agency: Food Safety & Consumer Protection
Area 30

, -

Form No.: NE03LF12-R00

NE Cert No: 20120040

Date: 3/26/2012

P.O. No:

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Serial #: 00-16623-01
Retest #: 1
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	49.8 °F	0.999709	0 in3

Test Measure Information

Water Temperature: 49.8 °F
Water Density: 0.999709 g/cm³
Scale Reading: -0.25 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0002 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons

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Serial #: 00-16623-02
Retest #: 0
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	50 °F	0.999699	0 in3

Test Measure Information

Water Temperature: 50 °F
Water Density: 0.999699 g/cm³
Scale Reading: -0.25 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0002 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons

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Serial #: 00-16623-02
Retest #: 1
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	49.7 °F	0.999714	0 in3

Test Measure Information

Water Temperature: 49.7 °F
Water Density: 0.999714 g/cm³
Scale Reading: -0.25 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0002 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons

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Serial #: 00-16623-03
Retest #: 0
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	50.3 °F	0.999684	0 in3

Test Measure Information

Water Temperature: 50.3 °F
Water Density: 0.999684 g/cm³
Scale Reading: -0.25 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0002 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons

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Serial #: 00-16623-03
Retest #: 1
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	49.9 °F	0.999704	0 in3

Test Measure Information

Water Temperature: 49.9 °F
Water Density: 0.999704 g/cm³
Scale Reading: -0.25 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0002 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons

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Serial #: 40702C
Retest #: 0
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	49.7 °F	0.999714	0 in3

Test Measure Information

Water Temperature: 49.7 °F
Water Density: 0.999714 g/cm³
Scale Reading: -0.2 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0000 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons

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SOP 19 - Volume Transfer Test Results

Agency ID: 30

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Serial #: 40702C
Retest #: 1
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	51.8 °F	0.999604	0 in3

Test Measure Information

Water Temperature: 51.8 °F
Water Density: 0.999604 g/cm³
Scale Reading: -0.25 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0002 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons

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SOP 19 - Volume Transfer Test Results

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Serial #: 40702D
Retest #: 0
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	50.5 °F	0.999674	0 in3

Test Measure Information

Water Temperature: 50.5 °F
Water Density: 0.999674 g/cm³
Scale Reading: -0.25 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0002 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons

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SOP 19 - Volume Transfer Test Results

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Serial #: 40702D
Retest #: 1
Denomination: 5 gal
Observer: CEO

Eq Vol/cu.in.: 1155 cu.in.
Tolerance Class: VL
Material: SS
Coef of Expansion: 0.0000265 °F

Test Data

Del#	Std ID	Delivery	Material	Coef of Exp	Water Temp	Water Density	Delta
1	5gal	4.9991	SS	0.0000265 /°F	50.4 °F	0.999679	0 in3

Test Measure Information

Water Temperature: 50.4 °F
Water Density: 0.999679 g/cm³
Scale Reading: -0.25 cu.in.

Test Results

Test Measure Volume @ 60° F at zero scale reading: 5.0002 gal.
Tolerance: 0.0025 gal.
Uncertainty: 0.0012 gal.

Accepted/Rejected: A

1 cubic meter = 264.172 gallons