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LAMPIRAN

7.1

Lampiran 1. Analisis ragam pengaruh konsentrasi garam dan lama pemasakan terhadap pH bakso.

Lampiran 1. Analisis ragam pengaruh level garam dan lama pemasakan terhadap pH bakso

Tests of Between-Subjects Effects

Dependent Variable: pH

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	.098 ^a	8	.012	2.612	.043
Intercept	735.185	1	735.185	157289.953	.000
A	.060	2	.030	6.467	.008
B	.011	2	.005	1.147	.340
A * B	.027	4	.007	1.418	.268
Error	.084	18	.005		
Total	735.367	27			
Corrected Total	.182	26			

a. R Squared = .537 (Adjusted R Squared = .332)

3. Perlakuan Garam * Perlakuan Waktu

Dependent Variable: pH

Perlakuan Garam	Perlakuan Waktu	Mean	Std. Error	95% Confidence Interval	
				Lower Bound	Upper Bound
kadar 2	5 menit	5.263	.039	5.180	5.346
	10 menit	5.297	.039	5.214	5.380
	15 menit	5.260	.039	5.177	5.343
kadar 3	5 menit	5.197	.039	5.114	5.280
	10 menit	5.123	.039	5.040	5.206
	15 menit	5.153	.039	5.070	5.236
kadar 4	5 menit	5.240	.039	5.157	5.323
	10 menit	5.150	.039	5.067	5.233
	15 menit	5.280	.039	5.197	5.363

pH

	Perlakuan Garam	N	Subset	
			1	2
Duncan ^{a,b}	kadar 3	9	5.1578	
	kadar 4	9	5.2233	5.2233
	kadar 2	9		5.2733
	Sig.		.057	.138

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = .005.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

pH

	Perlakuan Waktu	N	Subset
			1
Duncan ^{a,b}	10 menit	9	5.1900
	15 menit	9	5.2311
	5 menit	9	5.2333
	Sig.		.219

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = .005.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

7.2

Lampiran 2. Analisis ragam pengaruh konsentrasi garam dan lama pemasakan terhadap Aktivitas Antioksidan bakso.

Tests of Between-Subjects Effects

Dependent Variable: Antioksidan c

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	433.335 ^a	8	54.167	7.953	.000
Intercept	93397.926	1	93397.926	13713.001	.000
A	63.417	2	31.708	4.656	.023
B	150.259	2	75.130	11.031	.001
A * B	219.659	4	54.915	8.063	.001
Error	122.596	18	6.811		
Total	93953.857	27			
Corrected Total	555.931	26			

a. R Squared = .779 (Adjusted R Squared = .681)

3. Perlakuan Garam * Perlakuan Waktu

Dependent Variable: Antioksidan c

Perlakuan Garam	Perlakuan Waktu	Mean	Std. Error	95% Confidence Interval	
				Lower Bound	Upper Bound
kadar 2	5 menit	49.690	1.507	46.524	52.856
	10 menit	61.300	1.507	58.134	64.466
	15 menit	63.510	1.507	60.344	66.676
kadar 3	5 menit	55.547	1.507	52.381	58.712
	10 menit	56.707	1.507	53.541	59.872
	15 menit	59.790	1.507	56.624	62.956
kadar 4	5 menit	62.063	1.507	58.898	65.229
	10 menit	59.487	1.507	56.321	62.652
	15 menit	61.240	1.507	58.074	64.406

Antioksidan c

Duncan^{a,b}

Perlakuan Garam	N	Subset
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		1	2
kadar 3	9	57.3478	
kadar 2	9	58.1667	
kadar 4	9		60.9300
Sig.		.514	1.000

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 6.811.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

Antioksidan c

Duncan^{a,b}

Perlakuan Waktu	N	Subset	
		1	2
5 menit	9	55.7667	
10 menit	9		59.1644
15 menit	9		61.5133
Sig.		1.000	.072

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 6.811.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

7.3

Lampiran 3. Analisis ragam pengaruh konsentrasi garam dan lama pemasakan terhadap Aktivitas Antioksidan bakso.

Tests of Between-Subjects Effects

Dependent Variable: Protein terlarut

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	74.350 ^a	8	9.294	14.576	.000
Intercept	5937.191	1	5937.191	9311.455	.000
A	15.437	2	7.719	12.105	.000
B	57.822	2	28.911	45.342	.000
A * B	1.091	4	.273	.428	.787
Error	11.477	18	.638		
Total	6023.018	27			
Corrected Total	85.827	26			

a. R Squared = .866 (Adjusted R Squared = .807)

Descriptive Statistics

Dependent Variable: Protein terlarut

Perlakuan Garam	Perlakuan Waktu	Mean	Std. Deviation	N
kadar 2	5 menit	12.3567	.46318	3
	10 menit	14.4933	.25541	3
	15 menit	15.3033	.39209	3
	Total	14.0511	1.35883	9
kadar 3	5 menit	12.6767	1.12189	3
	10 menit	14.8633	.95296	3
	15 menit	16.2067	.58586	3
	Total	14.5822	1.73447	9
kadar 4	5 menit	13.5467	1.19123	3
	10 menit	16.4267	.78105	3
	15 menit	17.5867	.87523	3
	Total	15.8533	1.98594	9
Total	5 menit	12.8600	1.00373	9
	10 menit	15.2611	1.08889	9
	15 menit	16.3656	1.14346	9
	Total	14.8289	1.81688	27

Multiple Comparisons

Dependent Variable: Protein terlarut

	(I) Perlakuan Garam	(J) Perlakuan Garam	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
LSD	kadar 2	kadar 3	-.5311	.37642	.175	-1.3219	.2597
		kadar 4	-1.8022*	.37642	.000	-2.5931	-1.0114
	kadar 3	kadar 2	.5311	.37642	.175	-.2597	1.3219
		kadar 4	-1.2711*	.37642	.003	-2.0619	-.4803
	kadar 4	kadar 2	1.8022*	.37642	.000	1.0114	2.5931
		kadar 3	1.2711*	.37642	.003	.4803	2.0619

Based on observed means.

The error term is Mean Square(Error) = .638.

*. The mean difference is significant at the .05 level.

Protein terlarut

	Perlakuan Garam	N	Subset	
			1	2
Duncan ^{a,b}	kadar 2	9	14.0511	
	kadar 3	9	14.5822	
	kadar 4	9		15.8533
	Sig.		.175	1.000

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = .638.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

Multiple Comparisons

Dependent Variable: Protein terlarut

	(I) Perlakuan Waktu	(J) Perlakuan Waktu	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
LSD	5 menit	10 menit	-2.4011*	.37642	.000	-3.1919	-1.6103
		15 menit	-3.5056*	.37642	.000	-4.2964	-2.7147
	10 menit	5 menit	2.4011*	.37642	.000	1.6103	3.1919
		15 menit	-1.1044*	.37642	.009	-1.8953	-.3136
	15 menit	5 menit	3.5056*	.37642	.000	2.7147	4.2964
		10 menit	1.1044*	.37642	.009	.3136	1.8953

Based on observed means.

The error term is Mean Square(Error) = .638.

*. The mean difference is significant at the .05 level.

	Perlakuan Waktu	N	Subset		
			1	2	3
Duncan ^{a,b}	5 menit	9	12.8600		
	10 menit	9		15.2611	
	15 menit	9			16.3656
	Sig.		1.000	1.000	1.000

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = .638.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

7.4

Lampiran 4. Analisis ragam pengaruh konsentrasi garam dan lama pemasakan terhadap tingkat oksidasi lemak pada bakso.

Tests of Between-Subjects Effects

Dependent Variable: Ketengikan

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	.152 ^a	8	.019	4.728	.003
Intercept	.940	1	.940	234.794	.000
A	.035	2	.017	4.318	.029
B	.088	2	.044	11.031	.001
A * B	.029	4	.007	1.782	.176
Error	.072	18	.004		
Total	1.164	27			
Corrected Total	.224	26			

a. R Squared = .678 (Adjusted R Squared = .534)

Descriptive Statistics

Dependent Variable: Ketengikan

Perlakuan Garam	Perlakuan Waktu	Mean	Std. Deviation	N
kadar 2	5 menit	.3697	.04041	3
	10 menit	.1957	.09238	3
	15 menit	.1327	.03009	3
	Total	.2327	.11862	9
kadar 3	5 menit	.2393	.14725	3
	10 menit	.1788	.01026	3
	15 menit	.1273	.02887	3
	Total	.1818	.08951	9
kadar 4	5 menit	.1738	.03900	3
	10 menit	.1570	.00000	3
	15 menit	.1053	.02887	3
	Total	.1454	.03930	9
Total	5 menit	.2609	.11689	9
	10 menit	.1772	.04941	9
	15 menit	.1218	.02829	9
	Total	.1866	.09274	27

Ketengikan

Duncan^{a,b}

Perlakuan Garam	N	Subset	
		1	2
kadar 4	9	.1454	
kadar 3	9	.1818	.1818
kadar 2	9		.2327
Sig.		.238	.106

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = .004.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

Ketengikan

Duncan^{a,b}

Perlakuan Waktu	N	Subset	
		1	2
15 menit	9	.1218	
10 menit	9	.1772	
5 menit	9		.2609
Sig.		.080	1.000

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = .004.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

7.5

Lampiran 5. Analisis ragam pengaruh konsentrasi garam dan lama pemasakan terhadap warna bakso.

a). Kecerahan (L*)

Descriptive Statistics

Dependent Variable: Warna dalam L

Perlakuan Garam	Perlakuan Waktu	Mean	Std. Deviation	N
kadar 2	5 menit	33.6033	2.43270	3
	10 menit	34.9033	1.25933	3
	15 menit	25.5283	2.66867	3
	Total	31.3450	4.79632	9
kadar 3	5 menit	21.3100	.78519	3
	10 menit	22.1533	1.14963	3
	15 menit	25.4800	4.41823	3
	Total	22.9811	3.00176	9
kadar 4	5 menit	29.9333	2.34131	3
	10 menit	27.9900	1.00817	3
	15 menit	28.0150	2.62189	3
	Total	28.6461	2.06767	9
Total	5 menit	28.2822	5.73356	9
	10 menit	28.3489	5.61551	9
	15 menit	26.3411	3.15527	9
	Total	27.6574	4.87662	27

Tests of Between-Subjects Effects

Dependent Variable: Warna dalam L

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	519.403 ^a	8	64.925	11.815	.000
Intercept	20653.169	1	20653.169	3758.380	.000
A	327.993	2	163.996	29.843	.000
B	23.411	2	11.705	2.130	.148
A * B	168.000	4	42.000	7.643	.001
Error	98.914	18	5.495		
Total	21271.486	27			
Corrected Total	618.317	26			

a. R Squared = .840 (Adjusted R Squared = .769)

Warna dalam L

Duncan^{a,b}

Perlakuan Garam	N	Subset		
		1	2	3
kadar 3	9	22.9811		
kadar 4	9		28.6461	
kadar 2	9			31.3450
Sig.		1.000	1.000	1.000

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 5.495.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

Warna dalam L

Duncan^{a,b}

Perlakuan Waktu	N	Subset
		1
15 menit	9	26.3411
5 menit	9	28.2822
10 menit	9	28.3489
Sig.		.101

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 5.495.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

Multiple Comparisons

Dependent Variable: Warna dalam a

	(I) Perlakuan Garam	(J) Perlakuan Garam	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
LSD	kadar 2	kadar 3	2.5067*	1.09421	.034	.2078	4.8055
		kadar 4	3.4706*	1.09421	.005	1.1717	5.7694
	kadar 3	kadar 2	-2.5067*	1.09421	.034	-4.8055	-.2078
		kadar 4	.9639	1.09421	.390	-1.3350	3.2627
	kadar 4	kadar 2	-3.4706*	1.09421	.005	-5.7694	-1.1717
		kadar 3	-.9639	1.09421	.390	-3.2627	1.3350

Based on observed means.

The error term is Mean Square(Error) = 5.388.

*. The mean difference is significant at the .05 level.

a. Kemerahan (a*)q

Tests of Between-Subjects Effects

Dependent Variable: Warna dalam a

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	129.120 ^a	8	16.140	2.996	.025
Intercept	3478.435	1	3478.435	645.615	.000
A	57.772	2	28.886	5.361	.015
B	29.119	2	14.559	2.702	.094
A * B	42.230	4	10.557	1.960	.144
Error	96.980	18	5.388		
Total	3704.535	27			
Corrected Total	226.100	26			

a. R Squared = .571 (Adjusted R Squared = .380)

Warna dalam a

	Perlakuan Garam	N	Subset	
			1	2
Duncan ^{a,b}	kadar 4	9	9.8722	
	kadar 3	9	10.8361	
	kadar 2	9		13.3428

Sig.		.390	1.000
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Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 5.388.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

Multiple Comparisons

Dependent Variable: Warna dalam a

	(I) Perlakuan Waktu	(J) Perlakuan Waktu	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
LSD	5 menit	10 menit	.4617	1.09421	.678	-1.8372	2.7605
		15 menit	2.3972*	1.09421	.042	.0984	4.6961
	10 menit	5 menit	-.4617	1.09421	.678	-2.7605	1.8372
		15 menit	1.9356	1.09421	.094	-.3633	4.2344
	15 menit	5 menit	-2.3972*	1.09421	.042	-4.6961	-.0984
		10 menit	-1.9356	1.09421	.094	-4.2344	.3633

Based on observed means.

The error term is Mean Square(Error) = 5.388.

*. The mean difference is significant at the .05 level.

Warna dalam a

	Perlakuan Waktu	N	Subset
			1
Duncan ^{a,b}	15 menit	9	9.9061
	10 menit	9	11.8417
	5 menit	9	12.3033
	Sig.		.051

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 5.388.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

b. Kekuningan (b*)

Tests of Between-Subjects Effects

Dependent Variable: Warna dalam b

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	38.062 ^a	8	4.758	3.337	.016
Intercept	1480.371	1	1480.371	1038.202	.000
A	17.337	2	8.668	6.079	.010
B	6.651	2	3.325	2.332	.126
A * B	14.075	4	3.519	2.468	.082
Error	25.666	18	1.426		
Total	1544.099	27			
Corrected Total	63.728	26			

a. R Squared = .597 (Adjusted R Squared = .418)

Multiple Comparisons

Dependent Variable: Warna dalam b

	(I) Perlakuan	(J) Perlakuan	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
LSD	kadar 2	kadar 3	1.9550*	.56291	.003	.7724	3.1376
		kadar 4	.8261	.56291	.159	-.3565	2.0087
	kadar 3	kadar 2	-1.9550*	.56291	.003	-3.1376	-.7724
		kadar 4	-1.1289	.56291	.060	-2.3115	.0537
	kadar 4	kadar 2	-.8261	.56291	.159	-2.0087	.3565
		kadar 3	1.1289	.56291	.060	-.0537	2.3115

Based on observed means.

The error term is Mean Square(Error) = 1.426.

*. The mean difference is significant at the .05 level.

Warna dalam b

	Perlakuan Garam	N	Subset	
			1	2
Duncan ^{a,b}	kadar 3	9	6.3767	
	kadar 4	9	7.5056	7.5056
	kadar 2	9		8.3317
	Sig.		.060	.159

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 1.426.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

Multiple Comparisons

Dependent Variable: Warna dalam b

	(I) Perlakuan Waktu	(J) Perlakuan Waktu	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
LSD	5 menit	10 menit	1.2061*	.56291	.046	.0235	2.3887
		15 menit	.7350	.56291	.208	-.4476	1.9176
	10 menit	5 menit	-1.2061*	.56291	.046	-2.3887	-.0235
		15 menit	-.4711	.56291	.414	-1.6537	.7115
	15 menit	5 menit	-.7350	.56291	.208	-1.9176	.4476
		10 menit	.4711	.56291	.414	-.7115	1.6537

Based on observed means.

The error term is Mean Square(Error) = 1.426.

*. The mean difference is significant at the .05 level.

Warna dalam b

	Perlakuan Waktu	N	Subset
			1
Duncan ^{a,b}	10 menit	9	6.8456
	15 menit	9	7.3167
	5 menit	9	8.0517
	Sig.		.056

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 1.426.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

7.6

Lampiran 6. Analisis ragam pengaruh konsentrasi garam dan lama pemasakan terhadap Aktivitas Antioksidan bakso.

Descriptive Statistics

Dependent Variable: Gel Strength

Perlakuan Garam	Perlakuan Waktu	Mean	Std. Deviation	N
kadar 2	5 menit	2.1101	.10809	3
	10 menit	2.2583	.19312	3
	15 menit	2.4926	.13368	3
	Total	2.2870	.21120	9
kadar 3	5 menit	2.1980	.09461	3
	10 menit	2.5437	.02767	3
	15 menit	2.6700	.07774	3
	Total	2.4706	.22074	9
kadar 4	5 menit	2.2568	.05976	3
	10 menit	2.3466	.02367	3
	15 menit	2.8068	.00848	3
	Total	2.4701	.25758	9
Total	5 menit	2.1883	.10069	9
	10 menit	2.3829	.16022	9
	15 menit	2.6565	.15687	9
	Total	2.4092	.23851	27

Tests of Between-Subjects Effects

Dependent Variable: Gel Strength

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	1.305 ^a	8	.163	16.917	.000
Intercept	156.716	1	156.716	16247.078	.000
A	.202	2	.101	10.449	.001
B	.996	2	.498	51.612	.000
A * B	.108	4	.027	2.803	.057
Error	.174	18	.010		
Total	158.195	27			
Corrected Total	1.479	26			

a. R Squared = .883 (Adjusted R Squared = .830)

Gel Strength

	Perlakuan Garam	N	Subset	
			1	2
Duncan ^{a,b}	kadar 2	9	2.2870	
	kadar 4	9		2.4701
	kadar 3	9		2.4706
	Sig.		1.000	.992

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = .010.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

Gel Strength

	Perlakuan Waktu	N	Subset		
			1	2	3
Duncan ^{a,b}	5 menit	9	2.1883		
	10 menit	9		2.3829	
	15 menit	9			2.6565
	Sig.		1.000	1.000	1.000

Means for groups in homogeneous subsets are displayed.

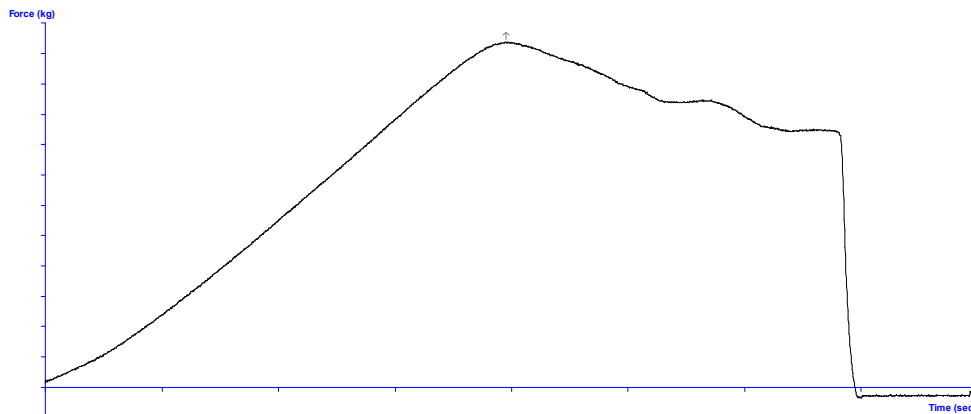
Based on observed means.

The error term is Mean Square(Error) = .010.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

Grafik Kekuatan Gel pada bakso dengan menggunakan alat Texture Analyzer



Lampiran 7. Analisis ragam pengaruh konsentrasi garam dan lama pemasakan terhadap Aktivitas Antioksidan bakso.

Descriptive Statistics

Dependent Variable: penyusutan

Perlakuan Garam	Perlakuan Waktu	Mean	Std. Deviation	N
kadar 2	5 menit	99.5556	4.43889	3
	10 menit	105.3333	4.37163	3
	15 menit	99.5556	4.53791	3
	Total	101.4815	4.81638	9
kadar 3	5 menit	102.6667	1.15470	3
	10 menit	100.6667	1.76383	3
	15 menit	101.3333	2.30940	3
	Total	101.5556	1.79505	9
kadar 4	5 menit	102.8889	2.03670	3
	10 menit	104.8889	1.67774	3
	15 menit	105.3333	3.33333	3
	Total	104.3704	2.40627	9
Total	5 menit	101.7037	2.98349	9
	10 menit	103.6296	3.35180	9
	15 menit	102.0741	3.97834	9
	Total	102.4691	3.43344	27

Tests of Between-Subjects Effects

Dependent Variable: penyusutan

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	131.984 ^a	8	16.498	1.702	.166
Intercept	283497.942	1	283497.942	29240.237	.000
A	48.823	2	24.412	2.518	.109
B	18.798	2	9.399	.969	.398
A * B	64.362	4	16.091	1.660	.203
Error	174.519	18	9.695		
Total	283804.444	27			
Corrected Total	306.502	26			

a. R Squared = .431 (Adjusted R Squared = .178)

penyusutan

Duncan^{a,b}

Perlakuan Garam	N	Subset
		1
kadar 2	9	101.4815
kadar 3	9	101.5556
kadar 4	9	104.3704
Sig.		.077

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 9.695.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

penyusutan

Duncan^{a,b}

Perlakuan Waktu	N	Subset
		1
5 menit	9	101.7037
15 menit	9	102.0741
10 menit	9	103.6296
Sig.		.230

Means for groups in homogeneous subsets are displayed.

Based on observed means.

The error term is Mean Square(Error) = 9.695.

a. Uses Harmonic Mean Sample Size = 9.000.

b. Alpha = .05.

7.7 Foto Dokumentasi Penelitian



