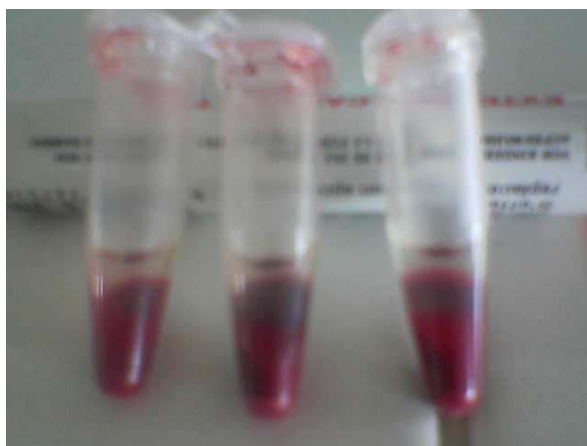


Lampiran 1. Sampel Darah Hewan Uji



**Sampel darah sebelum disentrifuge**



**Sampel darah setelah disentrifuge**

Lampiran 2. Hewan Uji



**Kelinci jantan albino**

Lampiran 3. Tanaman Jaka Tuwa



**Tanaman Jaka Tuwa (*Scoparia dulcis* L.)**

Lampiran 4. Gambar Alat



**Vortex Maxi Mix II**



**Ultra sentrifuse (Mini Spin Eppendorf)**

Lanjutan Lampiran 4

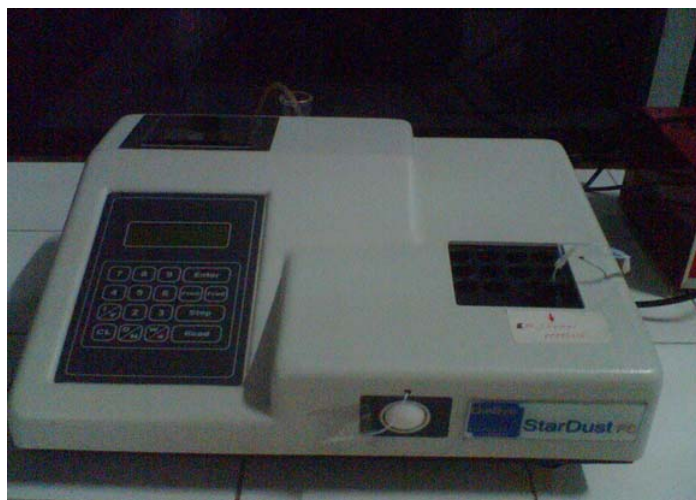


**Alat timbang bahan**



**Alat timbang hewan uji**

Lanjutan Lampiran 4



**Spektrofotometer Visibel Star Dust FC (DiaSys)**

## Lampiran 5. Perhitungan Rendemen Ekstrak Etanol 70% Herba Jaka Tuwa

Berat serbuk simplisia : 400,240 gram

Berat ekstrak kental etanol : 39,090 gram

$$\begin{aligned}\text{Rendemen} &= \frac{\text{Ekstrak kental etanol}}{\text{Serbuk simplisia}} \times 100\% \\ &= \frac{39,090 \text{ gram}}{400,240 \text{ gram}} \times 100\% \\ &= 9,77\%\end{aligned}$$

## Lampiran 6. Pembuatan Stok Dosis

## 1. Pembuatan stok dosis acarbose :

Dosis acarbose untuk manusia 70 kg = 50 mg (50 mg/70 kg)

Konversi dosis manusia 70 kg ke kelinci 1,5 kg = 0,07

$$= 50 \text{ mg} \times 0,07$$

$$= 3,5 \text{ mg}/1,5 \text{ kg}$$

$$= 2,33 \text{ mg/kgBB}$$

Dosis kelinci 1,5 kg = 3,5 mg

Volume pemberian = 3,5 mg/5ml

$$= 0,7 \text{ mg/ml}$$

$$= 70 \text{ mg}/100\text{ml}$$

Berat rata-rata 20 tablet acarbose = 134, 19 mg

$$\text{Acarbose untuk volume } 100\text{ml} = \frac{70 \text{ mg}}{50 \text{ mg}} \times 100\%$$

$$= 187,866 \text{ mg}/100 \text{ ml}$$

## 2. Pembuatan stok dosis ekstrak etanol 70% herba jaka tuwa

a. Dosis 100 mg/kgBB = 150 mg/1,5 kgBB

$$= 150 \text{ mg}/5 \text{ ml}$$

$$= 3000 \text{ mg}/100 \text{ ml}$$

$$= 3 \text{ gram}/100 \text{ ml}$$

b. Dosis 200 mg/kgBB = 300 mg/1,5 kgBB

$$= 300 \text{ mg}/5 \text{ ml}$$

$$= 6000 \text{ mg}/100 \text{ ml}$$

$$= 6 \text{ gram}/100 \text{ ml}$$

c. Dosis 400 mg/kgBB = 600 mg/1,5 kgBB

$$= 600 \text{ mg}/5 \text{ ml}$$

$$= 12000 \text{ mg}/100 \text{ ml}$$

$$= 12 \text{ gram}/100 \text{ ml}$$



## Lanjutan Lampiran 6

## 3. Pembuatan stok dosis glukosa 50%

Glukosa 50%= 50 g/100 ml

= 0,5 g/ml

= 5 ml/1,5 kgBB

= 3,33 ml/ kgBB

= 1,67 g/kgBB

Lampiran 7. Data Konsentrasi Kadar Glukosa Darah (mg/dl) tiap Kelompok Percobaan

Kelompok I. Kontrol Negatif CMC Na 1%

Waktu	Kelinci				Rata-rata±SEM
	1,4 kg	1,5 kg	1,5 kg	1,5 kg	
Seketika	94,39	104,09	112,67	123,11	108,57±5,30
0	125,00	107,31	118,46	138,84	122,40±6,59
30	175,00	205,77	188,15	188,98	189,48±6,31
60	218,85	211,92	193,94	198,35	205,76±5,80
90	231,54	162,31	247,43	194,22	208,87±19,11
120	224,23	147,69	128,38	141,87	160,54±21,61
150	190,00	136,92	123,14	137,19	146,81±14,77
180	139,62	133,46	103,03	133,33	127,36±8,24
210	126,92	126,92	115,98	102,20	118,01±5,87
240	118,08	126,92	107,71	102,76	113,87±5,40
270	116,15	124,23	91,19	96,14	106,93±7,90
300	139,23	133,08	102,76	97,52	118,15±10,53

Kelompok II. Kontrol Positif Acarbose 2,33 mg/kgBB

Waktu	Kelinci				Rata-rata±SEM
	1,85 kg	1,55 kg	1,6 kg	1,65 kg	
Seketika	97,74	104,08	100,67	103,81	101,33±1,71
0	106,35	110,77	104,14	107,93	107,30±1,39
30	133,70	165,75	218,79	150,13	167,09±18,43
60	131,68	182,32	130,66	189,00	158,42±15,79
90	129,83	155,53	132,04	185,42	150,71±12,95
120	103,59	121,82	125,69	172,38	130,87±14,65
150	106,35	100,00	121,27	137,60	116,31±8,38
180	89,78	93,92	110,77	91,30	96,45±4,85
210	100,00	87,02	92,54	86,45	91,50±3,15
240	89,50	106,91	72,93	87,47	89,20±6,96
270	83,70	88,12	107,74	83,12	90,67±5,80
300	92,82	100,55	90,06	79,80	90,81±4,29

## Lanjutan Lampiran 7

## Kelompok III. Ekstrak Etanol 70% Herba Jaka Tuwa Dosis 100 mg/kgBB

Waktu	Kelinci				Rata-rata±SEM
	1,55 kg	1,5 kg	1,6 kg	1,6 kg	
Seketika	95,71	85,71	101,66	107,84	97,73±4,71
0	122,86	86,43	104,05	110,81	106,04±7,61
30	126,67	125,71	167,88	133,51	138,44±9,96
60	84,76	124,76	113,24	131,35	113,53±10,29
90	82,62	107,38	98,12	100,81	97,23±5,25
120	88,57	107,38	100,27	101,08	99,33±3,92
150	88,57	106,67	98,11	96,22	97,39±3,72
180	80,48	99,05	96,76	93,51	92,45±1,15
210	77,62	100,00	96,48	89,93	91,01±4,93
240	76,67	97,14	85,97	77,57	84,33±4,75
270	76,43	81,67	83,51	77,30	79,73±1,71
300	71,91	66,43	80,00	77,57	73,98±3,03

## Kelompok IV. Ekstrak Etanol 70% Herba Jaka Tuwa Dosis 200 mg/kgBB

Waktu	Kelinci				Rata-rata±SEM
	1,6 kg	1,55 kg	1,5 kg	1,4 kg	
Seketika	78,38	113,37	92,10	106,08	97,48±7,75
0	99,46	146,50	110,64	113,68	117,57±10,12
30	107,03	165,96	125,23	117,93	129,04±12,86
60	100,54	140,43	102,74	155,93	124,91±13,81
90	97,84	128,88	100,61	153,50	120,20±13,13
120	99,19	117,33	90,88	135,87	110,82±10,01
150	84,87	106,38	96,66	103,04	97,74±4,74
180	84,87	108,51	86,32	93,13	93,21±5,41
210	85,68	99,96	85,41	93,62	91,17±3,50
240	82,43	89,06	84,19	76,80	83,12±2,53
270	81,62	91,79	83,59	81,76	84,69±2,41
300	80,00	76,29	83,89	107,76	86,99±7,10

## Lanjutan Lampiran 7

## Kelompok V. Ekstrak Etanol 70% Herba Jaka Tuwa Dosis 400 mg/kgBB

Waktu	Kelinci				Rata-rata±SEM
	1,6 kg	1,6 kg	1,8 kg	1,8 kg	
Seketika	99,52	87,86	88,65	71,62	86,91±5,75
0	150,48	105,24	140,81	99,46	124,00±12,71
30	141,43	107,14	135,16	126,76	127,62±7,46
60	123,57	101,43	127,03	94,05	111,52±8,13
90	108,57	102,62	100,00	94,05	101,31±3,01
120	86,19	100,24	93,51	88,11	92,01±3,15
150	80,71	81,67	94,32	84,86	85,39±3,11
180	77,86	87,86	88,38	77,84	82,98±2,97
210	75,24	78,10	89,19	81,62	81,04±3,01
240	74,05	70,00	86,49	61,35	72,97±5,22
270	82,86	71,19	83,24	70,89	77,05±73,47
300	59,29	59,52	81,89	58,69	64,85±5,68

Lampiran 8. Hasil Uji Statistik Kolmogorov-Smirnov dan Anava Satu Jalan AUC<sub>0</sub>.

## 300 Kadar Glukosa Darah Ekstrak Etanol 70% Herba Jaka Tuwa

## One-Sample Kolmogorov-Smirnov Test

		AUC
N		20
Normal Parameters <sup>a,b</sup>	Mean	33585.39
	Std. Deviation	7023.637
Most Extreme Differences	Absolute	.145
	Positive	.145
	Negative	-.133
Kolmogorov-Smirnov Z		.649
Asymp. Sig. (2-tailed)		.793

a. Test distribution is Normal.

b. Calculated from data.

## Oneway

## Descriptives

AUC	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean		Minimum	Maximum
					Lower Bound	Upper Bound		
					Kontrol Negatif	4		
Kontrol Positif	4	35707.74	2634.93167	1317.466	31514.9795	39900.5080	32031.93	38301.80
Ekstrak Etanol Herba Jaka Tuwa 100mg/kgBB	4	29503.20	2129.24911	1064.625	26115.0933	32891.3142	26392.86	30970.05
Ekstrak Etanol Herba Jaka Tuwa 200mg/kgBB	4	31114.86	3657.19622	1828.598	25295.4447	36934.2753	27413.54	34790.58
Ekstrak Etanol Herba Jaka Tuwa 400mg/kgBB	4	26663.96	1373.76615	686.88307	24477.9940	28849.9310	25758.30	28660.68
Total	20	33585.39	7023.63713	1570.533	30298.2251	36872.5519	25758.30	50174.99

## Test of Homogeneity of Variances

## AUC

Levene Statistic	df1	df2	Sig.
1.542	4	15	.240

## ANOVA

## AUC

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	8.16E+08	4	204041273.1	25.267	.000
Within Groups	1.21E+08	15	8075533.384		
Total	9.37E+08	19			

## Lanjutan Lampiran 8

## Post Hoc Tests

## Multiple Comparisons

Dependent Variable: AUC  
LSD

(I) Perlakuan	(J) Perlakuan	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
Kontrol Negatif	Kontrol Positif	9229.42875*	2009.419	.000	4946.4525	13512.4050
	Ekstrak Etanol Herba Jaka Tuwa 100mg/kgBB	15433.969*	2009.419	.000	11150.9925	19716.9450
	Ekstrak Etanol Herba Jaka Tuwa 200mg/kgBB	13822.313*	2009.419	.000	9539.3362	18105.2888
	Ekstrak Etanol Herba Jaka Tuwa 400mg/kgBB	18273.210*	2009.419	.000	13990.2337	22556.1863
Kontrol Positif	Kontrol Negatif	-9229.4288*	2009.419	.000	-13512.4050	-4946.4525
	Ekstrak Etanol Herba Jaka Tuwa 100mg/kgBB	6204.54000*	2009.419	.008	1921.5637	10487.5163
	Ekstrak Etanol Herba Jaka Tuwa 200mg/kgBB	4592.88375*	2009.419	.037	309.9075	8875.8600
	Ekstrak Etanol Herba Jaka Tuwa 400mg/kgBB	9043.78125*	2009.419	.000	4760.8050	13326.7575
Ekstrak Etanol Herba Jaka Tuwa 100mg/kgBB	Kontrol Negatif	-15433.969*	2009.419	.000	-19716.9450	-11150.9925
	Kontrol Positif	-6204.5400*	2009.419	.008	-10487.5163	-1921.5637
	Ekstrak Etanol Herba Jaka Tuwa 200mg/kgBB	-1611.6563	2009.419	.435	-5894.6325	2671.3200
	Ekstrak Etanol Herba Jaka Tuwa 400mg/kgBB	2839.24125	2009.419	.178	-1443.7350	7122.2175
Ekstrak Etanol Herba Jaka Tuwa 200mg/kgBB	Kontrol Negatif	-13822.313*	2009.419	.000	-18105.2888	-9539.3362
	Kontrol Positif	-4592.8837*	2009.419	.037	-8875.8600	-309.9075
	Ekstrak Etanol Herba Jaka Tuwa 100mg/kgBB	1611.65625	2009.419	.435	-2671.3200	5894.6325
	Ekstrak Etanol Herba Jaka Tuwa 400mg/kgBB	4450.89750*	2009.419	.043	167.9212	8733.8738
Ekstrak Etanol Herba Jaka Tuwa 400mg/kgBB	Kontrol Negatif	-18273.210*	2009.419	.000	-22556.1863	-13990.2337
	Kontrol Positif	-9043.7812*	2009.419	.000	-13326.7575	-4760.8050
	Ekstrak Etanol Herba Jaka Tuwa 100mg/kgBB	-2839.2412	2009.419	.178	-7122.2175	1443.7350
	Ekstrak Etanol Herba Jaka Tuwa 200mg/kgBB	-4450.8975*	2009.419	.043	-8733.8738	-167.9212

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

## Lampiran 9. Hasil Uji Statistik % PKGD (Penurunan Kadar Glukosa Darah)

**NPar Tests****One-Sample Kolmogorov-Smirnov Test**

		Varian
N		16
Normal Parameters <sup>a,b</sup>	Mean	82.8942
	Std. Deviation	2.28071
Most Extreme Differences	Absolute	.132
	Positive	.112
	Negative	-.132
Kolmogorov-Smirnov Z		.528
Asymp. Sig. (2-tailed)		.943

a. Test distribution is Normal.

b. Calculated from data.

**Oneway****Descriptives**

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean		Minimum	Maximum
					Lower Bound	Upper Bound		
Kontrol Positif	4	80.1345	1.46627	.73313	77.8013	82.4677	78.69	82.18
Ekstrak Etanol Herba Jaka Tuwa 100mg/kgB	4	83.5865	1.18471	.59235	81.7014	85.4716	82.77	85.32
Ekstrak Etanol Herba Jaka Tuwa 200mg/kgB	4	82.6898	2.03462	1.01731	79.4523	85.9273	80.64	84.75
Ekstrak Etanol Herba Jaka Tuwa 400mg/kgB	4	85.1660	.76441	.38220	83.9497	86.3823	84.06	85.67
Total	16	82.8942	2.28071	.57018	81.6789	84.1095	78.69	85.67

**Test of Homogeneity of Variances**

## Varian

Levene Statistic	df1	df2	Sig.
2.706	3	12	.092

Lanjutan lampiran 9

**ANOVA**

Varian

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	53.192	3	17.731	8.568	.003
Within Groups	24.832	12	2.069		
Total	78.025	15			

**Post Hoc Tests****Multiple Comparisons**

Dependent Variable: Varian

LSD

(I) Perlakuan	(J) Perlakuan	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
Kontrol Positif	Ekstrak Etanol Herba Jaka Tuwa 100mg/kgB	-3.45200*	1.01719	.005	-5.6683	-1.2357
	Ekstrak Etanol Herba Jaka Tuwa 200mg/kgB	-2.55530*	1.01719	.027	-4.7716	-.3390
	Ekstrak Etanol Herba Jaka Tuwa 400mg/kgB	-5.03150*	1.01719	.000	-7.2478	-2.8152
Ekstrak Etanol Herba Jaka Tuwa 100mg/kgB	Kontrol Positif	3.45200*	1.01719	.005	1.2357	5.6683
	Ekstrak Etanol Herba Jaka Tuwa 200mg/kgB	.89670	1.01719	.395	-1.3196	3.1130
	Ekstrak Etanol Herba Jaka Tuwa 400mg/kgB	-1.57950	1.01719	.146	-3.7958	.6368
Ekstrak Etanol Herba Jaka Tuwa 200mg/kgB	Kontrol Positif	2.55530*	1.01719	.027	.3390	4.7716
	Ekstrak Etanol Herba Jaka Tuwa 100mg/kgB	-.89670	1.01719	.395	-3.1130	1.3196
	Ekstrak Etanol Herba Jaka Tuwa 400mg/kgB	-2.47620*	1.01719	.031	-4.6925	-.2599
Ekstrak Etanol Herba Jaka Tuwa 400mg/kgB	Kontrol Positif	5.03150*	1.01719	.000	2.8152	7.2478
	Ekstrak Etanol Herba Jaka Tuwa 100mg/kgB	1.57950	1.01719	.146	-.6368	3.7958
	Ekstrak Etanol Herba Jaka Tuwa 200mg/kgB	2.47620*	1.01719	.031	.2599	4.6925

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



Lampiran 10. Hasil Determinasi Tanaman Jaka Tuwa

Lanjutan Lampiran 10