


LAMPIRAN

Lampiran 1. Hasil Validitas Taksonomi



**KEMENTERIAN KELAUTAN DAN PERIKANAN**  
**BADAN KARANTINA IKAN, PENGENDALIAN MUTU DAN KEAMANAN HASIL PERIKANAN**  
**BALAI KARANTINA IKAN, PENGENDALIAN MUTU**  
**DAN KEAMANAN HASIL PERIKANAN KELAS II SEMARANG**  
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Nomor : 984/17.0/KP.440/VII/2016  
 Sifat : Biasa  
 Perihal : Determinasi Udang Windu


Memenuhi permohonan saudara:  
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- Perihal Determinasi Udang Windu:
  - Fillum : *Arthropoda*
  - Kelas : *Crustaceae*
  - Ordo : *Decapoda*
  - Famili : *Panaeidae*
  - Genus : *Penaeus*
  - Spesies : *Penaeus monodon*
  - Kunci Determinas : Ordo Decapoda – 1a – Subordo Natantia – 1a – 2a – Superfamili Penaeidea – 1a – 2a – Subfamili Penainae – 1a – 2a – Genus Penaeus fabricius – 1a – 2b – 4a – 5 – Penaeus monodon fabricius.
- Morfologi : Udang Windu (*Penaeus monodon*) adalah spesies udang laut yang berukuran besar, dapat mencapai panjang 35 cm dan berat 260 gram. Sedangkan yang dipelihara di tambak dapat mencapai panjang 20 cm dan berat 140 gram. Memiliki kulit yang keras, berwarna hijau kebiruan dan berloreng-loreng besar. Pada kepala udang terdiri dari 6 ruas dan bagian dada udang terdiri dari 8 ruas yang tiap ruasnya memiliki sepasang anggota badan (*Tracopoda*).
- Kandungan : Kulit udang mengandung protein (25–40%), kalsium karbonat (45–50%), dan kitin (15–20%). Namun besarnya kandungan komponen tersebut tergantung ukuran dan jenis udang yang ada.
- Penggunaan : Penelitian
- Sumber :
  - Suyanto, S. R., Takarina, P. 2009. *Panduan Budidaya Udang Windu*. Jakarta: Penebar Swadaya.
  - Fox, Richard. 2006. *Brown Shrimp (Farfantepenaeus aztecus)*. Accessed from <http://lanwebs.lander.edu/faculty/rsfox/invertebrates/farfantepenaeus.html>.
  - Sahelian. M. D., Ray. 2015. *Health Benefit*. Accessed from <http://www.raysahelian.com/chitin.html>.

Semarang, 12 Juli 2016  
 Deputi Manajer Teknis



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 NIP. 19760411 200502 2 001





Lampiran 2. Hasil Uji Statistik

Uji Normalitas

Tests of Normality

	Kolmogorov-Smirnov <sup>a</sup>			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
Diameter	.175	28	.027	.938	28	.096

a. Lilliefors Significance Correction

Oneway

Descriptives

Diameter	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean		Minimum	Maximum
					Lower Bound	Upper Bound		
					0%	4		
20%	4	8.5750	.67515	.33758	7.5007	9.6493	7.70	9.20
40%	4	10.8250	1.36961	.68481	8.6456	13.0044	8.90	11.90
60%	4	11.7750	1.25797	.62899	9.7733	13.7767	10.10	13.10
80%	4	12.8750	1.29968	.64984	10.8069	14.9431	11.00	14.00
100%	4	13.4250	1.05633	.52817	11.7441	15.1059	11.90	14.30
chx	4	19.7000	3.41174	1.70587	14.2712	25.1288	14.60	21.60
Total	28	11.0250	5.79097	1.09439	8.7795	13.2705	.00	21.60

Test of Homogeneity of Variances

Diameter				
Levene Statistic	df 1	df 2	Sig.	
1.714	6	21	.167	

ANOVA

Diameter					
	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	850.375	6	141.729	54.039	.000
Within Groups	55.078	21	2.623		
Total	905.453	27			



## Post Hoc Tests

## Multiple Comparisons

Dependent Variable: Diameter

Tukey HSD

(I) Kelompok	(J) Kelompok	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
0%	20%	-8.5750*	1.14515	.000	-12.2976	-4.8524
	40%	-10.8250*	1.14515	.000	-14.5476	-7.1024
	60%	-11.7750*	1.14515	.000	-15.4976	-8.0524
	80%	-12.8750*	1.14515	.000	-16.5976	-9.1524
	100%	-13.4250*	1.14515	.000	-17.1476	-9.7024
	chx	-19.7000*	1.14515	.000	-23.4226	-15.9774
20%	0%	8.5750*	1.14515	.000	4.8524	12.2976
	40%	-2.2500	1.14515	.464	-5.9726	1.4726
	60%	-3.2000	1.14515	.123	-6.9226	.5226
	80%	-4.3000*	1.14515	.017	-8.0226	-.5774
	100%	-4.8500*	1.14515	.006	-8.5726	-1.1274
	chx	-11.1250*	1.14515	.000	-14.8476	-7.4024
40%	0%	10.8250*	1.14515	.000	7.1024	14.5476
	20%	2.2500	1.14515	.464	-1.4726	5.9726
	60%	-.9500	1.14515	.979	-4.6726	2.7726
	80%	-2.0500	1.14515	.568	-5.7726	1.6726
	100%	-2.6000	1.14515	.303	-6.3226	1.1226
	chx	-8.8750*	1.14515	.000	-12.5976	-5.1524
60%	0%	11.7750*	1.14515	.000	8.0524	15.4976
	20%	3.2000	1.14515	.123	-.5226	6.9226
	40%	.9500	1.14515	.979	-2.7726	4.6726
	80%	-1.1000	1.14515	.957	-4.8226	2.6226
	100%	-1.6500	1.14515	.774	-5.3726	2.0726
	chx	-7.9250*	1.14515	.000	-11.6476	-4.2024
80%	0%	12.8750*	1.14515	.000	9.1524	16.5976
	20%	4.3000*	1.14515	.017	.5774	8.0226
	40%	2.0500	1.14515	.568	-1.6726	5.7726
	60%	1.1000	1.14515	.957	-2.6226	4.8226
	100%	-.5500	1.14515	.999	-4.2726	3.1726
	chx	-6.8250*	1.14515	.000	-10.5476	-3.1024
100%	0%	13.4250*	1.14515	.000	9.7024	17.1476
	20%	4.8500*	1.14515	.006	1.1274	8.5726
	40%	2.6000	1.14515	.303	-1.1226	6.3226
	60%	1.6500	1.14515	.774	-2.0726	5.3726
	80%	.5500	1.14515	.999	-3.1726	4.2726
	chx	-6.2750*	1.14515	.000	-9.9976	-2.5524
chx	0%	19.7000*	1.14515	.000	15.9774	23.4226
	20%	11.1250*	1.14515	.000	7.4024	14.8476
	40%	8.8750*	1.14515	.000	5.1524	12.5976
	60%	7.9250*	1.14515	.000	4.2024	11.6476
	80%	6.8250*	1.14515	.000	3.1024	10.5476
	100%	6.2750*	1.14515	.000	2.5524	9.9976

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

### Homogeneous Subsets

#### Diameter

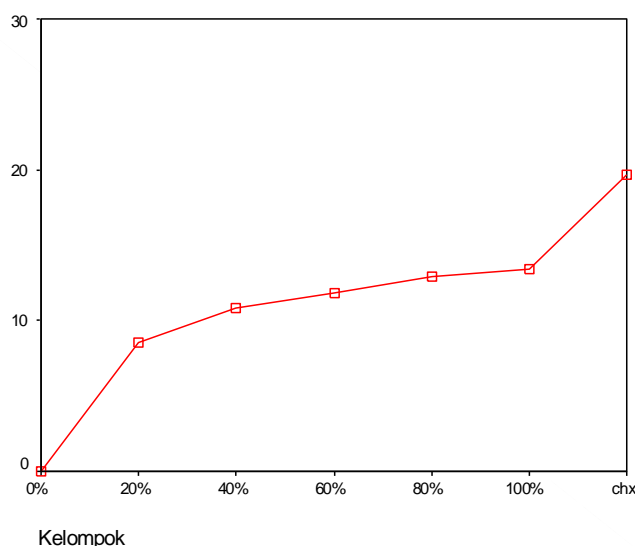
Tukey HSD<sup>a</sup>

Kelompok	N	Subset for alpha = .05			
		1	2	3	4
0%	4	.0000			
20%	4		8.5750		
40%	4		10.8250	10.8250	
60%	4		11.7750	11.7750	
80%	4			12.8750	
100%	4			13.4250	
chx	4				19.7000
Sig.		1.000	.123	.303	1.000

Means for groups in homogeneous subsets are displayed.

a. Uses Harmonic Mean Sample Size = 4.000.

### Means Plots



### Correlations

#### Correlations

		Konsentrasi	Diameter
Konsentrasi	Pearson Correlation	1	.849*
	Sig. (2-tailed)	.	.000
	N	24	24
Diameter	Pearson Correlation	.849*	1
	Sig. (2-tailed)	.000	.
	N	24	24

\*\*. Correlation is significant at the 0.01 level (2-tailed).



### Regression

**Model Summary**

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.849 <sup>a</sup>	.721	.709	2.56424

a. Predictors: (Constant), Konsentrasi

**ANOVA<sup>b</sup>**

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	374.683	1	374.683	56.983	.000 <sup>a</sup>
	Residual	144.657	22	6.575		
	Total	519.340	23			

a. Predictors: (Constant), Konsentrasi

b. Dependent Variable: Diameter

**Coefficients<sup>c</sup>**

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	3.795	.928		4.090	.000
	Konsentrasi	.116	.015	.849	7.549	.000

a. Dependent Variable: Diameter

### Interactive Graph

