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# LAMPIRAN

## LAMPIRAN

### Lampiran 1. Penentuan frekuensi kelas panjang standar

Kelas Terkecil	: 82
Kelas Terbesar	: 185
Log Terkecil	: 1,9138
Log Terbesar	: 2,2672
Beda Logaritma	: 0,3534
Banyak Kelas	: 10
Beda Logaritma tengah kelas	: 0,0353
Logaritma tengah kelas pertama	: 1,9315

#### Logaritma kelas

1.	1,9138	-	1,9491
2.	1,9491	-	1,9845
3.	1,9845	-	2,0198
4.	2,0198	-	2,0552
5.	2,0552	-	2,0905
6.	2,0905	-	2,1258
7.	2,1258	-	2,1612
8.	2,1612	-	2,1965
9.	2,1965	-	2,2318
10.	2,2318	-	2,2672

#### Kelas

1	82,00	-	88,95
2	88,95	-	96,49
3	96,49	-	104,67
4	104,67	-	113,54
5	113,54	-	123,17
6	123,17	-	133,61
7	133,61	-	144,93
8	144,93	-	157,22
9	157,22	-	170,54
10	170,54	-	185,00

Lampiran 2. Morfometrik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) jantan betina di Danau Tempe

No	Karakter	Kode	Jantan		Betina		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata $\pm$ sd	Kisaran (mm)	Rata-rata $\pm$ sd			
			n = 30		n = 31				
1	Panjang total	TL	112-174	145,80 $\pm$ 0,06	126-213	155,23 $\pm$ 0,06	0,490	2,002	Tidak berbeda nyata
2	Panjang kepala	HL	13-29	23,10 $\pm$ 0,02	18-33	24,43 $\pm$ 0,02	0,430	2,002	Tidak berbeda nyata
3	Lebar kepala	HW	10-16	12,83 $\pm$ 0,01	11-21	14,50 $\pm$ 0,01	-2,195	2,002	Berbeda nyata
4	Tinggi kepala	HD	15-29	20,60 $\pm$ 0,03	10-28	20,77 $\pm$ 0,03	1,432	2,002	Tidak berbeda nyata
5	Diameter mata	ED	6-9	7,767 $\pm$ 0,01	7-11	7,97 $\pm$ 0,01	1,593	2,002	Tidak berbeda nyata
6	Panjang moncong	SNL	7-12	9,07 $\pm$ 0,01	7-12	9,17 $\pm$ 0,01	2,077	2,002	Berbeda nyata
7	Jarak antar mata	IW	6-14	10,90 $\pm$ 0,01	8-18	11,67 $\pm$ 0,01	0,043	2,002	Tidak berbeda nyata
8	Panjang sebelum sirip dubur	PAL	64-99	83,87 $\pm$ 0,5	74-124	89,67 $\pm$ 0,48	0,132	2,002	Tidak berbeda nyata
9	Tinggi badan	BD	25-42	34,23 $\pm$ 0,05	30-55	38,60 $\pm$ 0,02	-2,819	2,002	Berbeda nyata
10	Lebar badan	BW	35-65	51,40 $\pm$ 0,4	49-81	55,27 $\pm$ 0,03	-0,157	2,002	Tidak berbeda nyata
11	Panjang sirip perut	PVL	10-27	19,67 $\pm$ 0,03	15-29	20,40 $\pm$ 0,02	0,814	2,002	Tidak berbeda nyata
12	Tinggi pangkal ekor	CPD	10-18	12,93 $\pm$ 0,01	10-21	13,53 $\pm$ 0,01	0,983	2,002	Tidak berbeda nyata
13	Panjang pangkal ekor	CPL	11-23	16,30 $\pm$ 0,02	12-29	17,73 $\pm$ 0,02	-0,388	2,002	Tidak berbeda nyata
14	Panjang dasar sirip punggung	DBL	30-52	41,60 $\pm$ 0,05	32-62	43,47 $\pm$ 0,05	0,656	2,002	Tidak berbeda nyata
15	Tinggi sirip punggung	DFH	34-51	40,73 $\pm$ 0,04	31-61	42,03 $\pm$ 0,03	1,424	2,002	Tidak berbeda nyata
16	Panjang sirip dada	PCL	10-25	19,63 $\pm$ 0,03	16-29	21,10 $\pm$ 0,02	-0,085	2,002	Tidak berbeda nyata
17	Panjang sebelum sirip perut	PPL	43-64	54,70 $\pm$ 0,03	49-85	59,23 $\pm$ 0,03	-0,601	2,002	Tidak berbeda nyata
18	Panjang dasar sirip anal/dubur	ABL	9-21	15,23 $\pm$ 0,03	8-22	14,37 $\pm$ 0,03	1,943	2,002	Tidak berbeda nyata
19	Panjang sebelum sirip punggung	PDL	37-55	46,90 $\pm$ 0,03	42-68	51,13 $\pm$ 0,03	-0,940	2,002	Tidak berbeda nyata
20	Panjang sungut moncong	SNBL	2-3	2,63 $\pm$ 0,00	2-4	2,80 $\pm$ 0,00	0,185	2,002	Tidak berbeda nyata
21	Panjang sungut rahang atas	MXBL	4-6	5,47 $\pm$ 0,01	4-7	5,10 $\pm$ 0,01	4,176	2,002	Tidak berbeda nyata

Lampiran 2. Lanjutan

No	Karakter	Kode	Jantan		Betina		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm) n = 30	Rata-rata $\pm$ sd	Kisaran (mm) n = 31	Rata-rata $\pm$ sd			
22	Panjang sirip ekor bagian atas	LUCL	24-38	32,17 $\pm$ 0,03	23-45	35,03 $\pm$ 0,04	-0,525	2,002	Tidak berbeda nyata
23	Panjang sirip ekor bagian tengah	LMCL	9-17	11,50 $\pm$ 0,01	10-16	12,00 $\pm$ 0,01	0,799	2,002	Tidak berbeda nyata
24	Panjang sirip ekor bagian bawah	LCLL	24-34	29,33 $\pm$ 0,02	25-45	32,67 $\pm$ 0,03	-1,548	2,002	Tidak berbeda nyata

Lampiran 3. Uji statistik morfometrik (mm) ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) jantan betina di Danau Tempe

Group Statistics

D_SEX		N	Mean	Std. Deviation	Std. Error Mean
TL	Jantan D.T.	30	1,2466	,05959	,01088
	Betina D.T.	30	1,2388	,06323	,01154
HL	Jantan D.T.	30	,1976	,02328	,00425
	Betina D.T.	30	,1951	,02275	,00415
HW	Jantan D.T.	30	,1098	,00971	,00177
	Betina D.T.	30	,1157	,01128	,00206
HD	Jantan D.T.	30	,1762	,02601	,00475
	Betina D.T.	30	,1659	,02930	,00535
ED	Jantan D.T.	30	,0664	,00671	,00122
	Betina D.T.	30	,0636	,00712	,00130
SNL	Jantan D.T.	30	,0775	,00863	,00158
	Betina D.T.	30	,0732	,00749	,00137
IW	Jantan D.T.	30	,0932	,01130	,00206
	Betina D.T.	30	,0931	,01330	,00243
PAL	Jantan D.T.	30	,7173	,05178	,00945
	Betina D.T.	30	,7156	,04764	,00870
BD	Jantan D.T.	30	,2928	,01813	,00331
	Betina D.T.	30	,3079	,02311	,00422
BW	Jantan D.T.	30	,4395	,04177	,00763
	Betina D.T.	30	,4410	,03117	,00569
PVL	Jantan D.T.	30	,1681	,02683	,00490
	Betina D.T.	30	,1629	,02244	,00410
CPD	Jantan D.T.	30	,1105	,00990	,00181
	Betina D.T.	30	,1078	,01180	,00215
CPL	Jantan D.T.	30	,1394	,01522	,00278
	Betina D.T.	30	,1410	,01791	,00327
DBL	Jantan D.T.	30	,3555	,05211	,00951
	Betina D.T.	30	,3470	,04799	,00876
DFH	Jantan D.T.	30	,3484	,03543	,00647
	Betina D.T.	30	,3356	,03417	,00624
PCL	Jantan D.T.	30	,1679	,03058	,00558
	Betina D.T.	30	,1685	,01820	,00332
PPL	Jantan D.T.	30	,4679	,02766	,00505
	Betina D.T.	30	,4727	,03484	,00636
ABL	Jantan D.T.	30	,1296	,02971	,00542
	Betina D.T.	30	,1143	,03146	,00574
PDL	Jantan D.T.	30	,4012	,03171	,00579
	Betina D.T.	30	,4082	,02564	,00468
SNBL	Jantan D.T.	30	,0225	,00395	,00072
	Betina D.T.	30	,0224	,00374	,00068



Lamiran 3 Lanjutan

D_SEX		N	Mean	Std. Deviation	Std. Error Mean
MXBL	Jantan D.T.	30	,0467	,00582	,00106
	Betina D.T.	30	,0407	,00521	,00095
LUCL	Jantan D.T.	30	,2751	,03068	,00560
	Betina D.T.	30	,2797	,03694	,00674
LMCL	Jantan D.T.	30	,0980	,01192	,00218
	Betina D.T.	30	,0957	,00953	,00174
LCLL	Jantan D.T.	30	,2506	,02301	,00420
	Betina D.T.	30	,2607	,02741	,00500

Lampiran 3. Lanjutan

**Independent Samples Test**

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	T	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
TL	Equal variances assumed	,483	,490	,490	58	,626	,00777	,01586	-,02398	,03953
	Equal variances not assumed			,490	57,798	,626	,00777	,01586	-,02398	,03953
HL	Equal variances assumed	,085	,771	,430	58	,669	,00256	,00594	-,00934	,01445
	Equal variances not assumed			,430	57,969	,669	,00256	,00594	-,00934	,01445
HW	Equal variances assumed	,184	,670	-2,195	58	,032	-,00596	,00272	-,01140	-,00052
	Equal variances not assumed			-2,195	56,740	,032	-,00596	,00272	-,01140	-,00052
HD	Equal variances assumed	,382	,539	1,432	58	,157	,01025	,00715	-,00407	,02457
	Equal variances not assumed			1,432	57,199	,157	,01025	,00715	-,00408	,02457
ED	Equal variances assumed	,010	,920	1,593	58	,117	,00284	,00179	-,00073	,00642
	Equal variances not assumed			1,593	57,795	,117	,00284	,00179	-,00073	,00642
SNL	Equal variances assumed	,150	,700	2,077	58	,042	,00433	,00209	,00016	,00851
	Equal variances not assumed			2,077	56,862	,042	,00433	,00209	,00016	,00851
IW	Equal variances assumed	2,346	,131	,043	58	,966	,00014	,00319	-,00624	,00651
	Equal variances not assumed			,043	56,520	,966	,00014	,00319	-,00624	,00652
PAL	Equal variances assumed	,054	,817	,132	58	,896	,00169	,01285	-,02402	,02740
	Equal variances not assumed			,132	57,602	,896	,00169	,01285	-,02403	,02741
BD	Equal variances assumed	1,681	,200	-2,819	58	,007	-,01512	,00536	-,02585	-,00438
	Equal variances not assumed			-2,819	54,881	,007	-,01512	,00536	-,02586	-,00437

Lampiran 3. Lanjutan

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	T	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
BW	Equal variances assumed	,892	,349	-,157	58	,876	-,00149	,00952	-,02054	,01755
	Equal variances not assumed			-,157	53,650	,876	-,00149	,00952	-,02057	,01759
PVL	Equal variances assumed	,011	,917	,814	58	,419	,00520	,00639	-,00758	,01798
	Equal variances not assumed			,814	56,243	,419	,00520	,00639	-,00759	,01799
CPD	Equal variances assumed	3,266	,076	,983	58	,330	,00276	,00281	-,00286	,00839
	Equal variances not assumed			,983	56,304	,330	,00276	,00281	-,00287	,00840
CPL	Equal variances assumed	1,829	,181	-,388	58	,700	-,00166	,00429	-,01025	,00693
	Equal variances not assumed			-,388	56,532	,700	-,00166	,00429	-,01026	,00693
DBL	Equal variances assumed	,418	,521	,656	58	,514	,00849	,01293	-,01740	,03438
	Equal variances not assumed			,656	57,610	,514	,00849	,01293	-,01741	,03438
DFH	Equal variances assumed	,052	,820	1,424	58	,160	,01280	,00899	-,00519	,03079
	Equal variances not assumed			1,424	57,923	,160	,01280	,00899	-,00519	,03079
PCL	Equal variances assumed	2,414	,126	-,085	58	,933	-,00055	,00650	-,01356	,01246
	Equal variances not assumed			-,085	47,254	,933	-,00055	,00650	-,01362	,01252
PPL	Equal variances assumed	1,461	,232	-,601	58	,550	-,00488	,00812	-,02114	,01138
	Equal variances not assumed			-,601	55,167	,550	-,00488	,00812	-,02115	,01139
ABL	Equal variances assumed	,038	,845	1,943	58	,057	,01535	,00790	-,00047	,03116
	Equal variances not assumed			1,943	57,812	,057	,01535	,00790	-,00047	,03116
PDL	Equal variances assumed	,605	,440	-,940	58	,351	-,00700	,00745	-,02190	,00791
	Equal variances not assumed			-,940	55,563	,351	-,00700	,00745	-,02192	,00792

Lampiran 3. Lanjutan

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
SNBL	Equal variances assumed	,483	,490	,185	58	,854	,00018	,00099	-,00180	,00217
	Equal variances not assumed			,185	57,828	,854	,00018	,00099	-,00180	,00217
MXBL	Equal variances assumed	2,833	,098	4,176	58	,000	,00596	,00143	,00310	,00881
	Equal variances not assumed			4,176	57,302	,000	,00596	,00143	,00310	,00881
LUCL	Equal variances assumed	,145	,704	-,525	58	,602	-,00460	,00877	-,02215	,01295
	Equal variances not assumed			-,525	56,113	,602	-,00460	,00877	-,02216	,01296
LMCL	Equal variances assumed	,367	,547	,799	58	,428	,00223	,00279	-,00335	,00781
	Equal variances not assumed			,799	55,317	,428	,00223	,00279	-,00336	,00781
LCLL	Equal variances assumed	,715	,401	-1,548	58	,127	-,01012	,00653	-,02320	,00296
	Equal variances not assumed			-1,548	56,312	,127	-,01012	,00653	-,02321	,00297

Lampiran 4. Uji statistik morfometrik (mm) ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) betina dan jantan di Danau Sidenreng

No	Karakter	Kode	Jantan		Betina		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata $\pm$ sd	Kisaran (mm)	Rata-rata $\pm$ sd			
			n = 30		n = 31				
1	Panjang total	TL	108-178	150,47 $\pm$ 0,06	130-216	159,63 $\pm$ 0,04	2,754	2,002	Berbeda nyata
2	Panjang kepala	HL	16-32	24,87 $\pm$ 0,02	19-36	25,97 $\pm$ 0,02	1,659	2,002	Tidak berbeda nyata
3	Lebar kepala	HW	9-28	14,53 $\pm$ 0,02	11-23	15,60 $\pm$ 0,02	0,270	2,002	Tidak berbeda nyata
4	Tinggi kepala	HD	15-33	23,03 $\pm$ 0,03	18-36	24,10 $\pm$ 0,03	1,135	2,002	Tidak berbeda nyata
5	Diameter mata	ED	6-10	7,83 $\pm$ 0,01	7-10	8,07 $\pm$ 0,01	2,368	2,002	Berbeda nyata
6	Panjang moncong	SNL	5-11	8,40 $\pm$ 0,01	6-11	8,73 $\pm$ 0,01	1,349	2,002	Tidak berbeda nyata
7	Jarak antar mata	IW	7-19	11,47 $\pm$ 0,02	10-15	12,20 $\pm$ 0,01	0,544	2,002	Tidak berbeda nyata
8	Panjang sebelum sirip dubur	PAL	61-106	88,37 $\pm$ 0,04	53-127	93,63 $\pm$ 0,07	1,424	2,002	Tidak berbeda nyata
9	Tinggi badan	BD	23-45	35,57 $\pm$ 0,03	30-55	39,97 $\pm$ 0,03	-1,270	2,002	Tidak berbeda nyata
10	Lebar badan	BW	35-69	54,40 $\pm$ 0,06	39-81	57,50 $\pm$ 0,04	1,057	2,002	Tidak berbeda nyata
11	Panjang sirip perut	PVL	10-25	19,00 $\pm$ 0,03	10-28	20,10 $\pm$ 0,02	0,874	2,002	Tidak berbeda nyata
12	Tinggi pangkal ekor	CPD	7-19	14,10 $\pm$ 0,02	10-24	14,63 $\pm$ 0,02	1,017	2,002	Tidak berbeda nyata
13	Panjang pangkal ekor	CPL	11-24	17,07 $\pm$ 0,03	10-30	18,17 $\pm$ 0,03	0,454	2,002	Tidak berbeda nyata
14	Panjang dasar sirip punggung	DBL	31-54	40,80 $\pm$ 0,05	30-62	43,33 $\pm$ 0,04	0,899	2,002	Tidak berbeda nyata
15	Tinggi sirip punggung	DFH	33-53	44,57 $\pm$ 0,04	22-58	44,53 $\pm$ 0,05	2,735	2,002	Berbeda nyata
16	Panjang sirip dada	PCL	10-25	18,23 $\pm$ 0,04	10-29	20,633 $\pm$ 0,03	-0,662	2,002	Tidak berbeda nyata
17	Panjang sebelum sirip perut	PPL	39-68	56,60 $\pm$ 0,03	48-86	60,13 $\pm$ 0,03	1,437	2,002	Tidak berbeda nyata
18	Panjang dasar sirip anal/dubur	ABL	8-25	14,57 $\pm$ 0,04	7-25	16,10 $\pm$ 0,04	-0,141	2,002	Tidak berbeda nyata
19	Panjang sebelum sirip punggung	PDL	35-62	49,93 $\pm$ 0,04	42-78	53,50 $\pm$ 0,03	0,766	2,002	Tidak berbeda nyata
20	Panjang sungut moncong	SNBL	2-3	2,70 $\pm$ 0,00	2-3	2,83 $\pm$ 0,00	1,072	2,002	Tidak berbeda nyata
21	Panjang sungut rahang atas	MXBL	4-6	5,37 $\pm$ 0,01	4-7	5,70 $\pm$ 0,01	0,884	2,002	Tidak berbeda nyata

Lampiran 4. Lanjutan

No	Karakter	Kode	Jantan		Betina		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata ± sd	Kisaran (mm)	Rata-rata ± sd			
			n = 30		n = 31				
22	Panjang sirip ekor bagian atas	LUCL	23-42	33,47 ± 0,03	27-47	36,03 ± 0,03	0,507	2,002	Tidak berbeda nyata
23	Panjang sirip ekor bagian tengah	LMCL	10-15	12,03 ± 0,01	10-15	12,57 ± 0,01	2,370	2,002	Berbeda nyata
24	Panjang sirip ekor bagian bawah	LCLL	20-38	30,87 ± 0,03	27-51	34,50 ± 0,03	-0,783	2,002	Tidak berbeda nyata

Lampiran 5. Uji statistik morfometrik (mm) ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) jantan betina di Danau Sidenreng

**Group Statistics**

	D_SEX	N	Mean	Std. Deviation	Std. Error Mean
TL	Jantan D.S.	30	1,3100	,05879	,01073
	Betina D.S.	30	1,2739	,04103	,00749
HL	Jantan D.S.	30	,2158	,01824	,00333
	Betina D.S.	30	,2073	,02159	,00394
HW	Jantan D.S.	30	,1258	,02360	,00431
	Betina D.S.	30	,1244	,01632	,00298
HD	Jantan D.S.	30	,2003	,02729	,00498
	Betina D.S.	30	,1923	,02732	,00499
ED	Jantan D.S.	30	,0682	,00705	,00129
	Betina D.S.	30	,0644	,00516	,00094
SNL	Jantan D.S.	30	,0731	,01068	,00195
	Betina D.S.	30	,0697	,00872	,00159
IW	Jantan D.S.	30	,0996	,01716	,00313
	Betina D.S.	30	,0974	,01298	,00237
PAL	Jantan D.S.	30	,7690	,04306	,00786
	Betina D.S.	30	,7472	,07209	,01316
BD	Jantan D.S.	30	,3093	,02958	,00540
	Betina D.S.	30	,3190	,02949	,00538
BW	Jantan D.S.	30	,4735	,06113	,01116
	Betina D.S.	30	,4590	,04322	,00789
PVL	Jantan D.S.	30	,1656	,02741	,00500
	Betina D.S.	30	,1599	,02238	,00409
CPD	Jantan D.S.	30	,1218	,01682	,00307
	Betina D.S.	30	,1168	,02105	,00384
CPL	Jantan D.S.	30	,1487	,02676	,00489
	Betina D.S.	30	,1451	,03499	,00639
DBL	Jantan D.S.	30	,3554	,04507	,00823
	Betina D.S.	30	,3452	,04237	,00774
DFH	Jantan D.S.	30	,3885	,03739	,00683
	Betina D.S.	30	,3557	,05399	,00986
PCL	Jantan D.S.	30	,1589	,03885	,00709
	Betina D.S.	30	,1646	,02706	,00494
PPL	Jantan D.S.	30	,4925	,03480	,00635
	Betina D.S.	30	,4801	,03250	,00593
ABL	Jantan D.S.	30	,1267	,03596	,00656
	Betina D.S.	30	,1281	,03916	,00715
PDL	Jantan D.S.	30	,4344	,03999	,00730
	Betina D.S.	30	,4270	,03496	,00638

Lampiran 5 Lanjutan

D_SEX		N	Mean	Std. Deviation	Std. Error Mean
SNBL	Jantan D.S.	30	,0235	,00359	,00066
	Betina D.S.	30	,0226	,00299	,00055
MXBL	Jantan D.S.	30	,0468	,00621	,00113
	Betina D.S.	30	,0455	,00513	,00094
LUCL	Jantan D.S.	30	,2917	,03080	,00562
	Betina D.S.	30	,2878	,03030	,00553
LMCL	Jantan D.S.	30	,1072	,01142	,00208
	Betina D.S.	30	,1003	,01099	,00201
LCLL	Jantan D.S.	30	,2689	,02889	,00527
	Betina D.S.	30	,2753	,03417	,00624



Lanjutan Lampiran 5

**Independent Samples Test**

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
TL	Equal variances assumed	1,585	,213	2,754	58	,008	,03604	,01309	,00984	,06224
	Equal variances not assumed			2,754	51,831	,008	,03604	,01309	,00978	,06231
HL	Equal variances assumed	,575	,451	1,659	58	,103	,00856	,00516	-,00177	,01889
	Equal variances not assumed			1,659	56,433	,103	,00856	,00516	-,00178	,01889
HW	Equal variances assumed	,689	,410	,270	58	,788	,00142	,00524	-,00907	,01190
	Equal variances not assumed			,270	51,580	,788	,00142	,00524	-,00910	,01193
HD	Equal variances assumed	,056	,813	1,135	58	,261	,00800	,00705	-,00611	,02211
	Equal variances not assumed			1,135	58,000	,261	,00800	,00705	-,00611	,02211
ED	Equal variances assumed	1,630	,207	2,368	58	,021	,00378	,00160	,00058	,00697
	Equal variances not assumed			2,368	53,162	,022	,00378	,00160	,00058	,00698
SNL	Equal variances assumed	,564	,456	1,349	58	,183	,00340	,00252	-,00164	,00843
	Equal variances not assumed			1,349	55,789	,183	,00340	,00252	-,00165	,00844
IW	Equal variances assumed	,115	,736	,544	58	,589	,00214	,00393	-,00573	,01000
	Equal variances not assumed			,544	54,000	,589	,00214	,00393	-,00574	,01001
PAL	Equal variances assumed	1,896	,174	1,424	58	,160	,02184	,01533	-,00885	,05252
	Equal variances not assumed			1,424	47,360	,161	,02184	,01533	-,00900	,05267
BD	Equal variances assumed	,179	,674	-1,270	58	,209	-,00969	,00763	-,02495	,00558
	Equal variances not assumed			-1,270	58,000	,209	-,00969	,00763	-,02495	,00558
BW	Equal variances assumed	1,687	,199	1,057	58	,295	,01444	,01367	-,01292	,04180
	Equal variances not assumed			1,057	52,192	,295	,01444	,01367	-,01298	,04187

Lampiran 5 Lanjutan

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
PVL	Equal variances assumed	,579	,450	,874	58	,386	,00565	,00646	-,00729	,01858
	Equal variances not assumed			,874	55,769	,386	,00565	,00646	-,00730	,01859
CPD	Equal variances assumed	2,626	,111	1,017	58	,314	,00500	,00492	-,00485	,01484
	Equal variances not assumed			1,017	55,308	,314	,00500	,00492	-,00486	,01485
CPL	Equal variances assumed	,778	,381	,454	58	,651	,00365	,00804	-,01244	,01975
	Equal variances not assumed			,454	54,274	,651	,00365	,00804	-,01247	,01978
DBL	Equal variances assumed	,119	,731	,899	58	,373	,01015	,01129	-,01246	,03276
	Equal variances not assumed			,899	57,780	,373	,01015	,01129	-,01246	,03276
DFH	Equal variances assumed	,746	,391	2,735	58	,008	,03280	,01199	,00879	,05680
	Equal variances not assumed			2,735	51,615	,009	,03280	,01199	,00873	,05686
PCL	Equal variances assumed	7,618	,008	-,662	58	,510	-,00573	,00864	-,02303	,01158
	Equal variances not assumed			-,662	51,779	,511	-,00573	,00864	-,02307	,01162
PPL	Equal variances assumed	,030	,863	1,437	58	,156	,01249	,00869	-,00491	,02989
	Equal variances not assumed			1,437	57,730	,156	,01249	,00869	-,00491	,02990
ABL	Equal variances assumed	,597	,443	-,141	58	,888	-,00137	,00971	-,02080	,01806
	Equal variances not assumed			-,141	57,583	,888	-,00137	,00971	-,02080	,01806
PDL	Equal variances assumed	,337	,564	,766	58	,447	,00743	,00970	-,01199	,02684
	Equal variances not assumed			,766	56,983	,447	,00743	,00970	-,01200	,02685
SNBL	Equal variances assumed	1,271	,264	1,072	58	,288	,00092	,00085	-,00079	,00262
	Equal variances not assumed			1,072	56,170	,288	,00092	,00085	-,00079	,00263

Lampiran 5 Lanjutan

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
MXBL	Equal variances assumed	4,021	,050	,884	58	,381	,00130	,00147	-,00164	,00424
	Equal variances not assumed			,884	55,976	,381	,00130	,00147	-,00165	,00425
LUCL	Equal variances assumed	,043	,837	,507	58	,614	,00400	,00789	-,01179	,01979
	Equal variances not assumed			,507	57,984	,614	,00400	,00789	-,01179	,01979
LMCL	Equal variances assumed	,000	,999	2,370	58	,021	,00686	,00289	,00107	,01265
	Equal variances not assumed			2,370	57,915	,021	,00686	,00289	,00107	,01265
LCLL	Equal variances assumed	,897	,347	-,783	58	,437	-,00640	,00817	-,02275	,00996
	Equal variances not assumed			-,783	56,440	,437	-,00640	,00817	-,02276	,00997

Lampiran 6. Uji statistik morfometrik (mm) ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) jantan di Danau Tempe dan Danau Sidenreng

No	Karakter	Kode	Danau Tempe		Danau Sidenreng		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata $\pm$ sd	Kisaran (mm)	Rata-rata $\pm$ sd			
			n = 30		n = 31				
1	Panjang total	TL	112-174	145,80 $\pm$ 0,06	108-178	150,47 $\pm$ 0,06	-4,148	2,002	Berbeda nyata
2	Panjang kepala	HL	13-29	23,10 $\pm$ 0,02	16-32	24,87 $\pm$ 0,02	-3,373	2,002	Berbeda nyata
3	Lebar kepala	HW	10-16	12,83 $\pm$ 0,01	9-28	14,53 $\pm$ 0,02	-3,448	2,002	Berbeda nyata
4	Tinggi kepala	HD	15-29	20,60 $\pm$ 0,03	15-33	23,03 $\pm$ 0,03	-3,505	2,002	Berbeda nyata
5	Diameter mata	ED	6-9	7,767 $\pm$ 0,01	6-10	7,83 $\pm$ 0,01	-0,999	2,002	Tidak berbeda nyata
6	Panjang moncong	SNL	7-12	9,07 $\pm$ 0,01	5-11	8,40 $\pm$ 0,01	1,748	2,002	Tidak berbeda nyata
7	Jarak antar mata	IW	6-14	10,90 $\pm$ 0,01	7-19	11,47 $\pm$ 0,02	-1,683	2,002	Tidak berbeda nyata
8	Panjang sebelum sirip dubur	PAL	64-99	83,87 $\pm$ 0,5	61-106	88,37 $\pm$ 0,04	-4,204	2,002	Berbeda nyata
9	Tinggi badan	BD	25-42	34,23 $\pm$ 0,05	23-45	35,57 $\pm$ 0,03	-2,615	2,002	Berbeda nyata
10	Lebar badan	BW	35-65	51,40 $\pm$ 0,4	35-69	54,40 $\pm$ 0,06	-2,511	2,002	Berbeda nyata
11	Panjang sirip perut	PVL	10-27	19,67 $\pm$ 0,03	10-25	19,00 $\pm$ 0,03	0,358	2,002	Tidak berbeda nyata
12	Tinggi pangkal ekor	CPD	10-18	12,93 $\pm$ 0,01	7-19	14,10 $\pm$ 0,02	-3,156	2,002	Berbeda nyata
13	Panjang pangkal ekor	CPL	11-23	16,30 $\pm$ 0,02	11-24	17,07 $\pm$ 0,03	-1,665	2,002	Tidak berbeda nyata
14	Panjang dasar sirip punggung	DBL	30-52	41,60 $\pm$ 0,05	31-54	40,80 $\pm$ 0,05	0,009	2,002	Tidak berbeda nyata
15	Tinggi sirip punggung	DFH	34-51	40,73 $\pm$ 0,04	33-53	44,57 $\pm$ 0,04	-4,267	2,002	Berbeda nyata
16	Panjang sirip dada	PCL	10-25	19,63 $\pm$ 0,03	10-25	18,23 $\pm$ 0,04	1,001	2,002	Tidak berbeda nyata
17	Panjang sebelum sirip perut	PPL	43-64	54,70 $\pm$ 0,03	39-68	56,60 $\pm$ 0,03	-3,043	2,002	Berbeda nyata
18	Panjang dasar sirip anal/dubur	ABL	9-21	15,23 $\pm$ 0,03	8-25	14,57 $\pm$ 0,04	0,347	2,002	Tidak berbeda nyata
19	Panjang sebelum sirip punggung	PDL	37-55	46,90 $\pm$ 0,03	35-62	49,93 $\pm$ 0,04	-3,569	2,002	Berbeda nyata
20	Panjang sungut moncong	SNBL	2-3	2,63 $\pm$ 0,00	2-3	2,70 $\pm$ 0,00	-1,031	2,002	Tidak berbeda nyata
21	Panjang sungut rahang atas	MXBL	4-6	5,47 $\pm$ 0,01	4-6	5,37 $\pm$ 0,01	-0,056	2,002	Tidak berbeda nyata

Lampiran 6 Lanjutan

No	Karakter	Kode	Danau Tempe		Danau Sidenreng		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata $\pm$ sd	Kisaran (mm)	Rata-rata $\pm$ sd			
			n = 30		n = 31				
22	Panjang sirip ekor bagian atas	LUCL	24-38	32,17 $\pm$ 0,03	23-42	33,47 $\pm$ 0,03	-2,101	2,002	Berbeda nyata
23	Panjang sirip ekor bagian tengah	LMCL	9-17	11,50 $\pm$ 0,01	10-15	12,03 $\pm$ 0,01	-3,062	2,002	Berbeda nyata
24	Panjang sirip ekor bagian bawah	LCLL	24-34	29,33 $\pm$ 0,02	20-38	30,87 $\pm$ 0,03	-2,723	2,002	Berbeda nyata

Lampiran 7. Uji statistik morfometrik (mm) ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) jantan di Danau Tempe dan Danau Sidenreng

**Group Statistics**

D_SEX	N	Mean	Std. Deviation	Std. Error Mean
TL Jantan D. T.	30	1,2466	,05959	,01088
TL Jantan D. S.	30	1,3100	,05879	,01073
HL Jantan D. T.	30	,1976	,02328	,00425
HL Jantan D. S.	30	,2158	,01824	,00333
HW Jantan D. T.	30	,1098	,00971	,00177
HW Jantan D. S.	30	,1258	,02360	,00431
HD Jantan D. T.	30	,1762	,02601	,00475
HD Jantan D. S.	30	,2003	,02729	,00498
ED Jantan D. T.	30	,0664	,00671	,00122
ED Jantan D. S.	30	,0682	,00705	,00129
SNL Jantan D. T.	30	,0775	,00863	,00158
SNL Jantan D. S.	30	,0731	,01068	,00195
IW Jantan D. T.	30	,0932	,01130	,00206
IW Jantan D. S.	30	,0996	,01716	,00313
PAL Jantan D. T.	30	,7173	,05178	,00945
PAL Jantan D. S.	30	,7690	,04306	,00786
BD Jantan D. T.	30	,2928	,01813	,00331
BD Jantan D. S.	30	,3093	,02958	,00540
BW Jantan D. T.	30	,4395	,04177	,00763
BW Jantan D. S.	30	,4735	,06113	,01116
PVL Jantan D. T.	30	,1681	,02683	,00490
PVL Jantan D. S.	30	,1656	,02741	,00500
CPD Jantan D. T.	30	,1105	,00990	,00181
CPD Jantan D. S.	30	,1218	,01682	,00307
CPL Jantan D. T.	30	,1394	,01522	,00278
CPL Jantan D. S.	30	,1487	,02676	,00489
DBL Jantan D. T.	30	,3555	,05211	,00951
DBL Jantan D. S.	30	,3554	,04507	,00823
DFH Jantan D. T.	30	,3484	,03543	,00647
DFH Jantan D. S.	30	,3885	,03739	,00683
PCL Jantan D. T.	30	,1679	,03058	,00558
PCL Jantan D. S.	30	,1589	,03885	,00709
PPL Jantan D. T.	30	,4679	,02766	,00505
PPL Jantan D. S.	30	,4925	,03480	,00635
ABL Jantan D. T.	30	,1296	,02971	,00542
ABL Jantan D. S.	30	,1267	,03596	,00656
PDL Jantan D. T.	30	,4012	,03171	,00579
PDL Jantan D. S.	30	,4344	,03999	,00730

Lampiran 7 Lanjutan

D_SEX		N	Mean	Std. Deviation	Std. Error Mean
SNBL	Jantan D. T.	30	,0225	,00395	,00072
	Jantan D. S.	30	,0235	,00359	,00066
MXBL	Jantan D. T.	30	,0467	,00582	,00106
	Jantan D. S.	30	,0468	,00621	,00113
LUCL	Jantan D. T.	30	,2751	,03068	,00560
	Jantan D. S.	30	,2917	,03080	,00562
LMCL	Jantan D. T.	30	,0980	,01192	,00218
	Jantan D. S.	30	,1072	,01142	,00208
LCLL	Jantan D. T.	30	,2506	,02301	,00420
	Jantan D. S.	30	,2689	,02889	,00527

Lampiran 7 Lanjutan

**Independent Samples Test**

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
TL	Equal variances assumed	,508	,479	-4,148	58	,000	-,06339	,01528	-,09398	-,03280
	Equal variances not assumed			-4,148	57,989	,000	-,06339	,01528	-,09398	-,03280
HL	Equal variances assumed	1,352	,250	-3,373	58	,001	-,01821	,00540	-,02902	-,00740
	Equal variances not assumed			-3,373	54,864	,001	-,01821	,00540	-,02904	-,00739
HW	Equal variances assumed	7,108	,010	-3,448	58	,001	-,01606	,00466	-,02539	-,00674
	Equal variances not assumed			-3,448	38,540	,001	-,01606	,00466	-,02549	-,00664
HD	Equal variances assumed	,227	,636	-3,505	58	,001	-,02412	,00688	-,03790	-,01034
	Equal variances not assumed			-3,505	57,868	,001	-,02412	,00688	-,03790	-,01034
ED	Equal variances assumed	,022	,883	-,999	58	,322	-,00177	,00178	-,00533	,00178
	Equal variances not assumed			-,999	57,856	,322	-,00177	,00178	-,00533	,00178
SNL	Equal variances assumed	,741	,393	1,748	58	,086	,00438	,00251	-,00064	,00940
	Equal variances not assumed			1,748	55,568	,086	,00438	,00251	-,00064	,00940
IW	Equal variances assumed	2,844	,097	-1,683	58	,098	-,00631	,00375	-,01382	,00119
	Equal variances not assumed			-1,683	50,165	,099	-,00631	,00375	-,01385	,00122
PAL	Equal variances assumed	1,013	,318	-4,204	58	,000	-,05169	,01230	-,07630	-,02707
	Equal variances not assumed			-4,204	56,135	,000	-,05169	,01230	-,07632	-,02706
BD	Equal variances assumed	8,230	,006	-2,615	58	,011	-,01656	,00633	-,02924	-,00388
	Equal variances not assumed			-2,615	48,090	,012	-,01656	,00633	-,02930	-,00383



Lampiran 7 Lanjutan

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
BW	Equal variances assumed	2,838	,097	-2,511	58	,015	-,03394	,01352	-,06100	-,00688
	Equal variances not assumed			-2,511	51,233	,015	-,03394	,01352	-,06107	-,00680
PVL	Equal variances assumed	,349	,557	,358	58	,722	,00250	,00700	-,01151	,01652
	Equal variances not assumed			,358	57,974	,722	,00250	,00700	-,01151	,01652
CPD	Equal variances assumed	4,546	,037	-3,156	58	,003	-,01124	,00356	-,01837	-,00411
	Equal variances not assumed			-3,156	46,945	,003	-,01124	,00356	-,01841	-,00408
CPL	Equal variances assumed	9,019	,004	-1,665	58	,101	-,00936	,00562	-,02061	,00189
	Equal variances not assumed			-1,665	45,991	,103	-,00936	,00562	-,02068	,00195
DBL	Equal variances assumed	,934	,338	,009	58	,993	,00012	,01258	-,02506	,02530
	Equal variances not assumed			,009	56,819	,993	,00012	,01258	-,02507	,02531
DFH	Equal variances assumed	,801	,374	-4,267	58	,000	-,04013	,00941	-,05896	-,02131
	Equal variances not assumed			-4,267	57,833	,000	-,04013	,00941	-,05896	-,02131
PCL	Equal variances assumed	5,500	,022	1,001	58	,321	,00904	,00903	-,00903	,02711
	Equal variances not assumed			1,001	54,969	,321	,00904	,00903	-,00905	,02713
PPL	Equal variances assumed	1,424	,238	-3,043	58	,004	-,02470	,00812	-,04094	-,00845
	Equal variances not assumed			-3,043	55,189	,004	-,02470	,00812	-,04096	-,00843
ABL	Equal variances assumed	,682	,412	,347	58	,730	,00295	,00852	-,01409	,02000
	Equal variances not assumed			,347	56,010	,730	,00295	,00852	-,01411	,02001
PDL	Equal variances assumed	,780	,381	-3,569	58	,001	-,03326	,00932	-,05192	-,01461
	Equal variances not assumed			-3,569	55,137	,001	-,03326	,00932	-,05194	-,01459

Lampiran 7 Lanjutan

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
SNBL	Equal variances assumed	1,257	,267	-1,031	58	,307	-,00101	,00097	-,00296	,00095
	Equal variances not assumed			-1,031	57,491	,307	-,00101	,00097	-,00296	,00095
MXBL	Equal variances assumed	,282	,597	-,056	58	,956	-,00009	,00155	-,00320	,00303
	Equal variances not assumed			-,056	57,754	,956	-,00009	,00155	-,00320	,00303
LUCL	Equal variances assumed	,159	,691	-2,101	58	,040	-,01667	,00794	-,03256	-,00078
	Equal variances not assumed			-2,101	57,999	,040	-,01667	,00794	-,03256	-,00078
LMCL	Equal variances assumed	,101	,751	-3,062	58	,003	-,00923	,00301	-,01526	-,00320
	Equal variances not assumed			-3,062	57,891	,003	-,00923	,00301	-,01526	-,00320
LCLL	Equal variances assumed	1,998	,163	-2,723	58	,009	-,01836	,00674	-,03186	-,00486
	Equal variances not assumed			-2,723	55,237	,009	-,01836	,00674	-,03187	-,00485

Lampiran 8. morfometrik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) j betina di Danau Tempe dan Danau Sidenreng

No	Karakter	Kode	Danau Tempe		Danau Sidenreng		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata $\pm$ sd n = 30	Kisaran (mm)	Rata-rata $\pm$ sd n = 31			
1	Panjang total	TL	126-213	155,23 $\pm$ 0,06	130-216	159,63 $\pm$ 0,04	-2,552	2,002	Berbeda nyata
2	Panjang kepala	HL	18-33	24,43 $\pm$ 0,02	19-36	25,97 $\pm$ 0,02	-2,132	2,002	Berbeda nyata
3	Lebar kepala	HW	11-21	14,50 $\pm$ 0,01	11-23	15,60 $\pm$ 0,02	-2,397	2,002	Berbeda nyata
4	Tinggi kepala	HD	10-28	20,77 $\pm$ 0,03	18-36	24,10 $\pm$ 0,03	-3,605	2,002	Berbeda nyata
5	Diameter mata	ED	7-11	7,97 $\pm$ 0,01	7-10	8,07 $\pm$ 0,01	-0,523	2,002	Tidak berebda nyata
6	Panjang moncong	SNL	7-12	9,17 $\pm$ 0,01	6-11	8,73 $\pm$ 0,01	1,641	2,002	Tidak berebda nyata
7	Jarak antar mata	IW	8-18	11,67 $\pm$ 0,01	10-15	12,20 $\pm$ 0,01	-1,271	2,002	Tidak berebda nyata
8	Panjang sebelum sirip dubur	PAL	74-124	89,67 $\pm$ 0,48	53-127	93,63 $\pm$ 0,07	-1,999	2,002	Tidak berebda nyata
9	Tinggi badan	BD	30-55	38,60 $\pm$ 0,02	30-55	39,97 $\pm$ 0,03	-1,627	2,002	Tidak berebda nyata
10	Lebar badan	BW	49-81	55,27 $\pm$ 0,03	39-81	57,50 $\pm$ 0,04	-1,850	2,002	Tidak berebda nyata
11	Panjang sirip perut	PVL	15-29	20,40 $\pm$ 0,02	10-28	20,10 $\pm$ 0,02	0,510	2,002	Tidak berebda nyata
12	Tinggi pangkal ekor	CPD	10-21	13,53 $\pm$ 0,01	10-24	14,63 $\pm$ 0,02	-2,045	2,002	Berbeda nyata
13	Panjang pangkal ekor	CPL	12-29	17,73 $\pm$ 0,02	10-30	18,17 $\pm$ 0,03	-0,563	2,002	Tidak berebda nyata
14	Panjang dasar sirip punggung	DBL	32-62	43,47 $\pm$ 0,05	30-62	43,33 $\pm$ 0,04	0,152	2,002	Tidak berebda nyata
15	Tinggi sirip punggung	DFH	31-61	42,03 $\pm$ 0,03	22-58	44,53 $\pm$ 0,05	-1,726	2,002	Tidak berebda nyata
16	Panjang sirip dada	PCL	16-29	21,10 $\pm$ 0,02	10-29	20,633 $\pm$ 0,03	0,649	2,002	Tidak berebda nyata
17	Panjang sebelum sirip perut	PPL	49-85	59,23 $\pm$ 0,03	48-86	60,13 $\pm$ 0,03	-0,842	2,002	Tidak berebda nyata
18	Panjang dasar sirip anal/dubur	ABL	8-22	14,37 $\pm$ 0,03	7-25	16,10 $\pm$ 0,04	-1,501	2,002	Tidak berebda nyata
19	Panjang sebelum sirip punggung	PDL	42-68	51,13 $\pm$ 0,03	42-78	53,50 $\pm$ 0,03	-2,380	2,002	Berbeda nyata
20	Panjang sungut moncong	SNBL	2-4	2,80 $\pm$ 0,00	2-3	2,83 $\pm$ 0,00	-0,313	2,002	Tidak berebda nyata
21	Panjang sungut rahang atas	MXBL	4-7	5,10 $\pm$ 0,01	4-7	5,70 $\pm$ 0,01	-3,554	2,002	Berbeda nyata

Lampiran 8 Lanjutan

No	Karakter	Kode	Danau Tempe		Danau Sidenreng		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata ± sd	Kisaran (mm)	Rata-rata ± sd			
			n = 30		n = 31				
22	Panjang sirip ekor bagian atas	LUCL	23-45	35,03 ± 0,04	27-47	36,03 ± 0,03	-0,926	2,002	Tidak berebda nyata
23	Panjang sirip ekor bagian tengah	LMCL	10-16	12,00 ± 0,01	10-15	12,57 ± 0,01	-1,732	2,002	Tidak berebda nyata
24	Panjang sirip ekor bagian bawah	LCLL	25-45	32,67 ± 0,03	27-51	34,50 ± 0,03	-1,831	2,002	Tidak berebda nyata

Lampiran 9. Uji statistik morfometrik (mm) ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) jantan di Danau Tempe dan Danau Sidenreng

**Group Statistics**

D_SEX		N	Mean	Std. Deviation	Std. Error Mean
TL	Betina D. T.	30	1,2388	,06323	,01154
	Betina D.S.	30	1,2739	,04103	,00749
HL	Betina D. T.	30	,1951	,02275	,00415
	Betina D.S.	30	,2073	,02159	,00394
	Betina D. T.	30	,1157	,01128	,00206
	Betina D.S.	30	,1244	,01632	,00298
HD	Betina D. T.	30	,1659	,02930	,00535
	Betina D.S.	30	,1923	,02732	,00499
ED	Betina D. T.	30	,0636	,00712	,00130
	Betina D.S.	30	,0644	,00516	,00094
SNL	Betina D. T.	30	,0732	,00749	,00137
	Betina D.S.	30	,0697	,00872	,00159
IW	Betina D. T.	30	,0931	,01330	,00243
	Betina D.S.	30	,0974	,01298	,00237
PAL	Betina D. T.	30	,7156	,04764	,00870
	Betina D.S.	30	,7472	,07209	,01316
BD	Betina D. T.	30	,3079	,02311	,00422
	Betina D.S.	30	,3190	,02949	,00538
BW	Betina D. T.	30	,4410	,03117	,00569
	Betina D.S.	30	,4590	,04322	,00789
PVL	Betina D. T.	30	,1629	,02244	,00410
	Betina D.S.	30	,1599	,02238	,00409
CPD	Betina D. T.	30	,1078	,01180	,00215
	Betina D.S.	30	,1168	,02105	,00384
CPL	Betina D. T.	30	,1410	,01791	,00327
	Betina D.S.	30	,1451	,03499	,00639
DBL	Betina D. T.	30	,3470	,04799	,00876
	Betina D.S.	30	,3452	,04237	,00774
DFH	Betina D. T.	30	,3356	,03417	,00624
	Betina D.S.	30	,3557	,05399	,00986
PCL	Betina D. T.	30	,1685	,01820	,00332
	Betina D.S.	30	,1646	,02706	,00494
PPL	Betina D. T.	30	,4727	,03484	,00636
	Betina D.S.	30	,4801	,03250	,00593
ABL	Betina D. T.	30	,1143	,03146	,00574
	Betina D.S.	30	,1281	,03916	,00715
PDL	Betina D. T.	30	,4082	,02564	,00468
	Betina D.S.	30	,4270	,03496	,00638
SNBL	Betina D. T.	30	,0224	,00374	,00068
	Betina D.S.	30	,0226	,00299	,00055

Lampiran 9 Lanjutan

D_SEX		N	Mean	Std. Deviation	Std. Error Mean
MXBL	Betina D. T.	30	,0407	,00521	,00095
	Betina D.S.	30	,0455	,00513	,00094
LUCL	Betina D. T.	30	,2797	,03694	,00674
	Betina D.S.	30	,2878	,03030	,00553
LMCL	Betina D. T.	30	,0957	,00953	,00174
	Betina D.S.	30	,1003	,01099	,00201
LCLL	Betina D. T.	30	,2607	,02741	,00500
	Betina D.S.	30	,2753	,03417	,00624

Lampiran 9 Lanjutan

**Independent Samples Test**

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
TL	Equal variances assumed	10,133	,002	-2,552	58	,013	-,03512	,01376	-,06267	-,00757
	Equal variances not assumed			-2,552	49,742	,014	-,03512	,01376	-,06276	-,00748
HL	Equal variances assumed	,008	,929	-2,132	58	,037	-,01221	,00573	-,02367	-,00075
	Equal variances not assumed			-2,132	57,840	,037	-,01221	,00573	-,02367	-,00075
HW	Equal variances assumed	5,772	,020	-2,397	58	,020	-,00868	,00362	-,01593	-,00143
	Equal variances not assumed			-2,397	51,553	,020	-,00868	,00362	-,01595	-,00141
HD	Equal variances assumed	,001	,975	-3,605	58	,001	-,02637	,00731	-,04101	-,01173
	Equal variances not assumed			-3,605	57,719	,001	-,02637	,00731	-,04101	-,01173
ED	Equal variances assumed	2,518	,118	-,523	58	,603	-,00084	,00161	-,00405	,00237
	Equal variances not assumed			-,523	52,901	,603	-,00084	,00161	-,00406	,00238
SNL	Equal variances assumed	,292	,591	1,641	58	,106	,00344	,00210	-,00076	,00764
	Equal variances not assumed			1,641	56,693	,106	,00344	,00210	-,00076	,00765
IW	Equal variances assumed	,101	,752	-1,271	58	,209	-,00431	,00339	-,01110	,00248
	Equal variances not assumed			-1,271	57,965	,209	-,00431	,00339	-,01110	,00248
PAL	Equal variances assumed	,723	,399	-1,999	58	,050	-,03154	,01578	-,06312	,00004
	Equal variances not assumed			-1,999	50,274	,051	-,03154	,01578	-,06322	,00014
BD	Equal variances assumed	,970	,329	-1,627	58	,109	-,01113	,00684	-,02483	,00256
	Equal variances not assumed			-1,627	54,867	,109	-,01113	,00684	-,02484	,00258

Lanjutan Lampiran 9

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
BW	Equal variances assumed	2,800	,100	-1,850	58	,069	-,01800	,00973	-,03747	,00147
	Equal variances not assumed			-1,850	52,745	,070	-,01800	,00973	-,03751	,00151
PVL	Equal variances assumed	,038	,847	,510	58	,612	,00295	,00579	-,00863	,01453
	Equal variances not assumed			,510	58,000	,612	,00295	,00579	-,00863	,01453
CPD	Equal variances assumed	8,826	,004	-2,045	58	,045	-,00901	,00440	-,01782	-,00019
	Equal variances not assumed			-2,045	45,587	,047	-,00901	,00440	-,01788	-,00014
CPL	Equal variances assumed	5,952	,018	-,563	58	,575	-,00404	,00718	-,01841	,01032
	Equal variances not assumed			-,563	43,219	,576	-,00404	,00718	-,01852	,01043
DBL	Equal variances assumed	,401	,529	,152	58	,879	,00178	,01169	-,02162	,02518
	Equal variances not assumed			,152	57,125	,879	,00178	,01169	-,02162	,02518
DFH	Equal variances assumed	2,698	,106	-1,726	58	,090	-,02014	,01167	-,04349	,00322
	Equal variances not assumed			-1,726	49,014	,091	-,02014	,01167	-,04358	,00331
PCL	Equal variances assumed	3,211	,078	,649	58	,519	,00386	,00595	-,00806	,01578
	Equal variances not assumed			,649	50,782	,519	,00386	,00595	-,00809	,01582
PPL	Equal variances assumed	,025	,875	-,842	58	,403	-,00732	,00870	-,02473	,01009
	Equal variances not assumed			-,842	57,722	,403	-,00732	,00870	-,02474	,01009
ABL	Equal variances assumed	2,177	,145	-1,501	58	,139	-,01376	,00917	-,03212	,00459
	Equal variances not assumed			-1,501	55,425	,139	-,01376	,00917	-,03214	,00461
PDL	Equal variances assumed	1,051	,309	-2,380	58	,021	-,01884	,00792	-,03469	-,00299
	Equal variances not assumed			-2,380	53,195	,021	-,01884	,00792	-,03472	-,00296



Lampiran 9 Lanjutan

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
SNBL	Equal variances assumed	2,531	,117	-,313	58	,756	-,00027	,00087	-,00202	,00148
	Equal variances not assumed			-,313	55,351	,756	-,00027	,00087	-,00203	,00148
MXBL	Equal variances assumed	,039	,843	-3,554	58	,001	-,00474	,00133	-,00741	-,00207
	Equal variances not assumed			-3,554	57,985	,001	-,00474	,00133	-,00741	-,00207
LUCL	Equal variances assumed	,292	,591	-,926	58	,358	-,00808	,00872	-,02554	,00938
	Equal variances not assumed			-,926	55,866	,358	-,00808	,00872	-,02555	,00940
LMCL	Equal variances assumed	1,267	,265	-1,732	58	,089	-,00460	,00266	-,00992	,00072
	Equal variances not assumed			-1,732	56,866	,089	-,00460	,00266	-,00992	,00072
LCLL	Equal variances assumed	1,955	,167	-1,831	58	,072	-,01464	,00800	-,03065	,00137
	Equal variances not assumed			-1,831	55,395	,073	-,01464	,00800	-,03067	,00139



Lampiran 10. Meristik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) betina dan jantan di Danau Tempe

No	Karakter	Kode	Jantan		Betina		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata $\pm$ sd	Kisaran (mm)	Rata-rata $\pm$ sd			
			n = 30		n = 31				
1	Jumlah jari-jari keras sirip punggung	A	2-3	2,20 $\pm$ 0,41	2-3	2,20 $\pm$ 0,41	0,000	2,002	Tidak berbeda nyata
2	Jumlah jari-jari lemah sirip punggung	B	15-16	15,40 $\pm$ 0,50	14-16	15,23 $\pm$ 0,63	1,141	2,002	Tidak berbeda nyata
3	Jumlah jari-jari keras sirip dubur	C	2-3	2,60 $\pm$ 0,50	2-3	2,77 $\pm$ 0,43	-1,387	2,002	Tidak berbeda nyata
4	Jumlah jari-jari lemah sirip dubur	D	5-6	5,90 $\pm$ 0,31	5-6	5,87 $\pm$ 0,35	0,396	2,002	Tidak berbeda nyata
5	Jumlah jari-jari sirip dada	E	11-13	12,20 $\pm$ 0,76	11-13	12,40 $\pm$ 0,72	-1,043	2,002	Tidak berbeda nyata
6	Jumlah jari-jari keras sirip perut	F	1	1,00 $\pm$ 0,00	1	1,00 $\pm$ 0,00	-	2,002	Tidak berbeda nyata
7	Jumlah jari-jari lemah sirip perut	G	7-8	7,67 $\pm$ 0,48	7-8	7,60 $\pm$ 0,50	0,528	2,002	Tidak berbeda nyata
8	Jumlah jari-jari sirip ekor	H	22-24	22,43 $\pm$ 0,68	22-24	22,23 $\pm$ 0,50	1,296	2,002	Tidak berbeda nyata
9	Jumlah sisik sebelum sirip ekor	I	9-12	10,10 $\pm$ 1,03	8-12	10,03 $\pm$ 1,07	0,246	2,002	Tidak berbeda nyata
10	Jumlah sisik pada garis lateral atau gurat sisik	J	30-33	31,90 $\pm$ 1,32	30-35	32,70 $\pm$ 1,26	-2,396	2,002	Berbeda nyata
11	Jumlah Sisik pada batang ekor	K	7-10	8,00 $\pm$ 0,79	7-10	8,23 $\pm$ 0,68	-1,229	2,002	Tidak berbeda nyata
12	Jumlah sisik melintang tubuh	L	10-12	11,60 $\pm$ 0,62	11-12	11,57 $\pm$ 0,50	0,228	2,002	Tidak berbeda nyata

Lampiran 11. Hasil uji statistik meristik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) betina dan jantan di Danau Tempe

**Group Statistics**

	D_SEX	N	Mean	Std. Deviation	Std. Error Mean
A	Jantan D. T.	30	2,2000	,40684	,07428
	Betina D. T.	30	2,2000	,40684	,07428
B	Jantan D. T.	30	15,4000	,49827	,09097
	Betina D. T.	30	15,2333	,62606	,11430
C	Jantan D. T.	30	2,6000	,49827	,09097
	Betina D. T.	30	2,7667	,43018	,07854
D	Jantan D. T.	30	5,9000	,30513	,05571
	Betina D. T.	30	5,8667	,34575	,06312
E	Jantan D. T.	30	12,2000	,76112	,13896
	Betina D. T.	30	12,4000	,72397	,13218
F	Jantan D. T.	30	1,0000	,00000 <sup>a</sup>	0,00000
	Betina D. T.	30	1,0000	,00000 <sup>a</sup>	0,00000
G	Jantan D. T.	30	7,6667	,47946	,08754
	Betina D. T.	30	7,6000	,49827	,09097
H	Jantan D. T.	30	22,4333	,67891	,12395
	Betina D. T.	30	22,2333	,50401	,09202
I	Jantan D. T.	30	10,1000	1,02889	,18785
	Betina D. T.	30	10,0333	1,06620	,19466
J	Jantan D. T.	30	31,9000	1,32222	,24140
	Betina D. T.	30	32,7000	1,26355	,23069
K	Jantan D. T.	30	8,0000	,78784	,14384
	Betina D. T.	30	8,2333	,67891	,12395
L	Jantan D. T.	30	11,6000	,62146	,11346
	Betina D. T.	30	11,5667	,50401	,09202

a. t cannot be computed because the standard deviations of both groups are

Lampiran 11 Lanjutan

	Levene's Test for Equality of Variances		t-test for Equality of Means							
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference		
								Lower	Upper	
A	Equal variances assumed	,000	1,000	0,000	58	1,000	0,00000	,10505	-,21027	,21027
	Equal variances not assumed			0,000	58,000	1,000	0,00000	,10505	-,21027	,21027
B	Equal variances assumed	,221	,640	1,141	58	,259	,16667	,14609	-,12576	,45909
	Equal variances not assumed			1,141	55,219	,259	,16667	,14609	-,12607	,45940
C	Equal variances assumed	7,162	,010	-1,387	58	,171	-,16667	,12019	-,40724	,07391
	Equal variances not assumed			-1,387	56,791	,171	-,16667	,12019	-,40735	,07402
D	Equal variances assumed	,633	,430	,396	58	,694	,03333	,08419	-,13519	,20186
	Equal variances not assumed			,396	57,117	,694	,03333	,08419	-,13525	,20192
E	Equal variances assumed	,000	1,000	-1,043	58	,301	-,20000	,19179	-,58390	,18390
	Equal variances not assumed			-1,043	57,855	,301	-,20000	,19179	-,58392	,18392
G	Equal variances assumed	1,069	,305	,528	58	,599	,06667	,12625	-,18605	,31938
	Equal variances not assumed			,528	57,914	,599	,06667	,12625	-,18606	,31939

Lampiran 11 Lanjutan

	Levene's Test for Equality of Variances		t-test for Equality of Means							
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference		
								Lower	Upper	
H	Equal variances assumed	5,563	,022	1,296	58	,200	,20000	,15437	-,10901	,50901
	Equal variances not assumed			1,296	53,518	,201	,20000	,15437	-,10957	,50957
I	Equal variances assumed	,271	,605	,246	58	,806	,06667	,27052	-,47483	,60817
	Equal variances not assumed			,246	57,927	,806	,06667	,27052	-,47485	,60818
J	Equal variances assumed	2,414	,126	-2,396	58	,020	-,80000	,33391	-	1,46839
	Equal variances not assumed			-2,396	57,881	,020	-,80000	,33391	-	1,46842
K	Equal variances assumed	,190	,665	-1,229	58	,224	-,23333	,18988	-,61342	,14675
	Equal variances not assumed			-1,229	56,761	,224	-,23333	,18988	-,61359	,14693
L	Equal variances assumed	,554	,460	,228	58	,820	,03333	,14609	-,25909	,32576
	Equal variances not assumed			,228	55,629	,820	,03333	,14609	-,25935	,32602

Lampiran 12. Meristik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) betina dan jantan di Danau Sidenreng

No	Karakter	Kode	Jantan		Betina		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata $\pm$ sd	Kisaran (mm)	Rata-rata $\pm$ sd			
			n = 30		n = 31				
1	Jumlah jari-jari keras sirip punggung	A	2-3	2,17 $\pm$ 0,38	2-3	2,37 $\pm$ 0,49	-1,768	2,002	Tidak berbeda nyata
2	Jumlah jari-jari lemah sirip punggung	B	14-16	15,07 $\pm$ 0,69	13-16	14,67 $\pm$ 0,80	2,068	2,002	Berbeda nyata
3	Jumlah jari-jari keras sirip dubur	C	2-3	2,73 $\pm$ 0,45	2-3	2,80 $\pm$ 0,41	-0,602	2,002	Tidak berbeda nyata
4	Jumlah jari-jari lemah sirip dubur	D	5-6	5,37 $\pm$ 0,49	5-6	5,57 $\pm$ 0,50	-1,558	2,002	Tidak berbeda nyata
5	Jumlah jari-jari sirip dada	E	11-13	12,47 $\pm$ 0,63	11-14	12,57 $\pm$ 0,86	-0,515	2,002	Tidak berbeda nyata
6	Jumlah jari-jari keras sirip perut	F	1	1,00 $\pm$ 0,00	1	1,00 $\pm$ 0,00	-	2,002	Tidak berbeda nyata
7	Jumlah jari-jari lemah sirip perut	G	6-8	7,37 $\pm$ 0,56	7-8	7,57 $\pm$ 0,50	-1,460	2,002	Tidak berbeda nyata
8	Jumlah jari-jari sirip ekor	H	22-24	22,17 $\pm$ 0,46	22-25	22,50 $\pm$ 0,94	-1,747	2,002	Tidak berbeda nyata
9	Jumlah sisik sebelum sirip ekor	I	8-12	9,70 $\pm$ 1,26	8-12	9,90 $\pm$ 1,37	-0,587	2,002	Tidak berbeda nyata
10	Jumlah sisik pada garis lateral atau gurat sisik	J	30-34	31,67 $\pm$ 1,65	30-35	32,13 $\pm$ 1,70	-1,081	2,002	Tidak berbeda nyata
11	Jumlah Sisik pada batang ekor	K	7-9	7,87 $\pm$ 0,63	7-10	8,33 $\pm$ 0, 71	-2,693	2,002	Berbeda nyata
12	Jumlah sisik melintang tubuh	L	10-12	11,33 $\pm$ 0,80	10-12	11,40 $\pm$ 0,67	-0,348	2,002	Tidak berbeda nyata

Lampiran 13. Hasil uji statistik meristik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) betina dan jantan di Danau Sidenreng

**Group Statistics**

D_SEX	N	Mean	Std. Deviation	Std. Error Mean
A Jantan D. S.	30	2,1667	,3790	,0692
Betina D. S.	30	2,3667	,4901	,0895
B Jantan D. S.	30	15,0667	,6915	,1262
Betina D. S.	30	14,6667	,8023	,1465
C Jantan D. S.	30	2,7333	,4498	,0821
Betina D. S.	30	2,8000	,4068	,0743
D Jantan D. S.	30	5,3667	,4901	,0895
Betina D. S.	30	5,5667	,5040	,0920
E Jantan D. S.	30	12,4667	,6288	,1148
Betina D. S.	30	12,5667	,8584	,1567
F Jantan D. S.	30	1,0000	,0000	,0000
Betina D. S.	30	1,0000	,0000	,0000
G Jantan D. S.	30	7,3667	,5561	,1015
Betina D. S.	30	7,5667	,5040	,0920
H Jantan D. S.	30	22,1667	,4611	,0842
Betina D. S.	30	22,5000	,9377	,1712
I Jantan D. S.	30	9,7000	1,2635	,2307
Betina D. S.	30	9,9000	1,3734	,2507
J Jantan D. S.	30	31,6667	1,6470	,3007
Betina D. S.	30	32,1333	1,6965	,3097
K Jantan D. S.	30	7,8667	,6288	,1148
Betina D. S.	30	8,3333	,7112	,1298
L Jantan D. S.	30	11,3333	,8023	,1465
Betina D. S.	30	11,4000	,6747	,1232

a. t cannot be computed because the standard deviations of both groups are 0.



Lampiran 13 Lanjutan

Independent Samples Test

	Levene's Test for Equality of Variances		t-test for Equality of Means							
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference		
								Lower	Upper	
A	12,915	,001	Equal variances assumed	-1,768	58	,082	-,20000	,11312	-,42644	,02644
			Equal variances not assumed	-1,768	54,550	,083	-,20000	,11312	-,42675	,02675
B	2,109	,152	Equal variances assumed	2,068	58	,043	,40000	,19338	,01291	,78709
			Equal variances not assumed	2,068	56,764	,043	,40000	,19338	,01273	,78727
C	1,464	,231	Equal variances assumed	-,602	58	,549	-,06667	,11073	-,28831	,15498
			Equal variances not assumed	-,602	57,426	,549	-,06667	,11073	-,28836	,15503
D	,988	,324	Equal variances assumed	-1,558	58	,125	-,20000	,12836	-,45693	,05693
			Equal variances not assumed	-1,558	57,955	,125	-,20000	,12836	-,45694	,05694
E	2,624	,111	Equal variances assumed	-,515	58	,609	-,10000	,19427	-,48887	,28887
			Equal variances not assumed	-,515	53,166	,609	-,10000	,19427	-,48962	,28962
G	,151	,699	Equal variances assumed	-1,460	58	,150	-,20000	,13702	-,47427	,07427
			Equal variances not assumed	-1,460	57,449	,150	-,20000	,13702	-,47433	,07433

Lampiran 13 Lanjutan

	Levene's Test for Equality of Variances		t-test for Equality of Means							
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference		
								Lower	Upper	
H	Equal variances assumed	10,167	,002	-1,747	58	,086	-,33333	,19078	-,71523	,04856
	Equal variances not assumed			-1,747	42,251	,088	-,33333	,19078	-,71828	,05162
I	Equal variances assumed	,430	,515	-,587	58	,559	-,20000	,34072	-,88203	,48203
	Equal variances not assumed			-,587	57,602	,560	-,20000	,34072	-,88213	,48213
J	Equal variances assumed	,323	,572	-1,081	58	,284	-,46667	,43169	-1,33080	,39746
	Equal variances not assumed			-1,081	57,949	,284	-,46667	,43169	-1,33081	,39748
K	Equal variances assumed	1,851	,179	-2,693	58	,009	-,46667	,17332	-,81360	-,11974
	Equal variances not assumed			-2,693	57,143	,009	-,46667	,17332	-,81371	-,11963
L	Equal variances assumed	1,822	,182	-,348	58	,729	-,06667	,19139	-,44977	,31643
	Equal variances not assumed			-,348	56,342	,729	-,06667	,19139	-,45001	,31667

Lampiran 14. Meristik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) jantan di Danau Tempe dan Danau Sidenreng

No	Karakter	Kode	Danau Tempe		Danau Sidenreng		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata $\pm$ sd	Kisaran (mm)	Rata-rata $\pm$ sd			
			n = 30		n = 31				
1	Jumlah jari-jari keras sirip punggung	A	2-3	2,20 $\pm$ 0,41	2-3	2,17 $\pm$ 0,38	0,328	2,002	Tidak berbeda nyata
2	Jumlah jari-jari lemah sirip punggung	B	15-16	15,40 $\pm$ 0,50	14-16	15,07 $\pm$ 0,69	2,142	2,002	Berbeda nyata
3	Jumlah jari-jari keras sirip dubur	C	2-3	2,60 $\pm$ 0,50	2-3	2,73 $\pm$ 0,45	-1,088	2,002	Tidak berbeda nyata
4	Jumlah jari-jari lemah sirip dubur	D	5-6	5,90 $\pm$ 0,31	5-6	5,37 $\pm$ 0,49	5,060	2,002	Berbeda nyata
5	Jumlah jari-jari sirip dada	E	11-13	12,20 $\pm$ 0,76	11-13	12,47 $\pm$ 0,63	-1,479	2,002	Tidak berbeda nyata
6	Jumlah jari-jari keras sirip perut	F	1	1,00 $\pm$ 0,00	1	1,00 $\pm$ 0,00	-	2,002	Tidak berbeda nyata
7	Jumlah jari-jari lemah sirip perut	G	7-8	7,67 $\pm$ 0,48	6-8	7,37 $\pm$ 0,56	2,238	2,002	Berbeda nyata
8	Jumlah jari-jari sirip ekor	H	22-24	22,43 $\pm$ 0,68	22-24	22,17 $\pm$ 0,46	1,780	2,002	Tidak berbeda nyata
9	Jumlah sisik sebelum sirip ekor	I	9-12	10,10 $\pm$ 1,03	8-12	9,70 $\pm$ 1,26	1,345	2,002	Tidak berbeda nyata
10	Jumlah sisik pada garis lateral atau gurat sisik	J	30-33	31,90 $\pm$ 1,32	30-34	31,67 $\pm$ 1,65	0,605	2,002	Tidak berbeda nyata
11	Jumlah Sisik pada batang ekor	K	7-10	8,00 $\pm$ 0,79	7-9	7,87 $\pm$ 0,63	0,724	2,002	Tidak berbeda nyata
12	Jumlah sisik melintang tubuh	L	10-12	11,60 $\pm$ 0,62	10-12	11,33 $\pm$ 0,80	1,439	2,002	Tidak berbeda nyata

Lampiran 15. Hasil uji statistik meristik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) jantan di Danau Tempe dan Danau Sidenreng

**Group Statistics**

D_SEX	N	Mean	Std. Deviation	Std. Error Mean
A	Jantan D. T.	2,2000	,40684	,07428
	Jantan D. S.	2,1667	,37905	,06920
B	Jantan D. T.	15,4000	,49827	,09097
	Jantan D. S.	15,0667	,69149	,12625
C	Jantan D. T.	2,6000	,49827	,09097
	Jantan D. S.	2,7333	,44978	,08212
D	Jantan D. T.	5,9000	,30513	,05571
	Jantan D. S.	5,3667	,49013	,08949
E	Jantan D. T.	12,2000	,76112	,13896
	Jantan D. S.	12,4667	,62881	,11480
F	Jantan D. T.	1,0000	,00000 <sup>a</sup>	0,00000
	Jantan D. S.	1,0000	,00000 <sup>a</sup>	0,00000
G	Jantan D. T.	7,6667	,47946	,08754
	Jantan D. S.	7,3667	,55605	,10152
H	Jantan D. T.	22,4333	,67891	,12395
	Jantan D. S.	22,1667	,46113	,08419
I	Jantan D. T.	10,1000	1,02889	,18785
	Jantan D. S.	9,7000	1,26355	,23069
J	Jantan D. T.	31,9000	1,32222	,24140
	Jantan D. S.	31,6667	1,64701	,30070
K	Jantan D. T.	8,0000	,78784	,14384
	Jantan D. S.	7,8667	,62881	,11480
L	Jantan D. T.	11,6000	,62146	,11346
	Jantan D. S.	11,3333	,80230	,14648

a. t cannot be computed because the standard deviations of both groups are 0.

Lampiran 15 Lanjutan

**Independent Samples Test**

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
A	Equal variances assumed	,433	,513	,328	58	,744	,0333	,1015	-,1699	,2365
	Equal variances not assumed			,328	57,712	,744	,0333	,1015	-,1699	,2366
B	Equal variances assumed	,041	,840	2,142	58	,036	,3333	,1556	,0218	,6448
	Equal variances not assumed			2,142	52,720	,037	,3333	,1556	,0212	,6455
C	Equal variances assumed	4,391	,041	-1,088	58	,281	-,1333	,1226	-,3786	,1120
	Equal variances not assumed			-1,088	57,402	,281	-,1333	,1226	-,3787	,1120
D	Equal variances assumed	31,659	,000	5,060	58	,000	,5333	,1054	,3223	,7443
	Equal variances not assumed			5,060	48,543	,000	,5333	,1054	,3215	,7452
E	Equal variances assumed	,702	,406	-1,479	58	,144	-,2667	,1803	-,6275	,0941
	Equal variances not assumed			-1,479	56,006	,145	-,2667	,1803	-,6278	,0944
G	Equal variances assumed	1,679	,200	2,238	58	,029	,3000	,1340	,0317	,5683
	Equal variances not assumed			2,238	56,771	,029	,3000	,1340	,0315	,5685

Lampiran 15 Lanjutan

	Levene's Test for Equality of Variances		t-test for Equality of Means							
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference		
								Lower	Upper	
H	Equal variances assumed	10,351	,002	1,780	58	,080	,2667	,1498	-,0333	,5666
	Equal variances not assumed			1,780	51,062	,081	,2667	,1498	-,0341	,5675
I	Equal variances assumed	3,115	,083	1,345	58	,184	,4000	,2975	-,1955	,9955
	Equal variances not assumed			1,345	55,713	,184	,4000	,2975	-,1960	,9960
J	Equal variances assumed	8,123	,006	,605	58	,547	,2333	,3856	-,5386	1,0052
	Equal variances not assumed			,605	55,410	,548	,2333	,3856	-,5393	1,0060
K	Equal variances assumed	,001	,974	,724	58	,472	,1333	,1840	-,2351	,5017
	Equal variances not assumed			,724	55,282	,472	,1333	,1840	-,2354	,5021
L	Equal variances assumed	4,462	,039	1,439	58	,155	,2667	,1853	-,1042	,6375
	Equal variances not assumed			1,439	54,588	,156	,2667	,1853	-,1047	,6380

Lampiran 16. Meristik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) betina di Danau Tempe dan Danau Sidenreng

No	Karakter	Kode	Danau Tempe		Danau Sidenreng		$t_{hitung}$	$t_{tabel}$	ket.
			Kisaran (mm)	Rata-rata $\pm$ sd	Kisaran (mm)	Rata-rata $\pm$ sd			
			n = 30		n = 31				
1	Jumlah jari-jari keras sirip punggung	A	2-3	2,20 $\pm$ 0,41	2-3	2,37 $\pm$ 0,49	-1,433	2,002	Tidak berbeda nyata
2	Jumlah jari-jari lemah sirip punggung	B	14-16	15,23 $\pm$ 0,63	13-16	14,67 $\pm$ 0,80	3,050	2,002	Berbeda nyata
3	Jumlah jari-jari keras sirip dubur	C	2-3	2,77 $\pm$ 0,43	2-3	2,80 $\pm$ 0,41	-0,308	2,002	Tidak berbeda nyata
4	Jumlah jari-jari lemah sirip dubur	D	5-6	5,87 $\pm$ 0,35	5-6	5,57 $\pm$ 0,50	2,688	2,002	Berbeda nyata
5	Jumlah jari-jari sirip dada	E	11-13	12,40 $\pm$ 0,72	11-14	12,57 $\pm$ 0,86	-0,813	2,002	Tidak berbeda nyata
6	Jumlah jari-jari keras sirip perut	F	1	1,00 $\pm$ 0,00	1	1,00 $\pm$ 0,00	-	2,002	Tidak berbeda nyata
7	Jumlah jari-jari lemah sirip perut	G	7-8	7,60 $\pm$ 0,50	7-8	7,57 $\pm$ 0,50	0,258	2,002	Tidak berbeda nyata
8	Jumlah jari-jari sirip ekor	H	22-24	22,23 $\pm$ 0,50	22-25	22,50 $\pm$ 0,94	-1,372	2,002	Tidak berbeda nyata
9	Jumlah sisik sebelum sirip ekor	I	8-12	10,03 $\pm$ 1,07	8-12	9,90 $\pm$ 1,37	0,420	2,002	Tidak berbeda nyata
10	Jumlah sisik pada garis lateral atau gurat sisik	J	30-35	32,70 $\pm$ 1,26	30-35	32,13 $\pm$ 1,70	1,467	2,002	Tidak berbeda nyata
11	Jumlah Sisik pada batang ekor	K	7-10	8,23 $\pm$ 0,68	7-10	8,33 $\pm$ 0,71	-0,557	2,002	Tidak berbeda nyata
12	Jumlah sisik melintang tubuh	L	11-12	11,57 $\pm$ 0,50	10-12	11,40 $\pm$ 0,67	1,084	2,002	Tidak berbeda nyata

Lampiran 17. Hasil uji statistik meristik ikan nilem, *Osteochilus vittatus* (Valenciennes, 1842) betina di Danau Tempe dan Danau Sidenreng

**Group Statistics**

D_SEX	N	Mean	Std. Deviation	Std. Error Mean	
A	Betina D. T.	30	2,2000	,40684	,07428
	Betina D. s.	30	2,3667	,49013	,08949
B	Betina D. T.	30	15,2333	,62606	,11430
	Betina D. s.	30	14,6667	,80230	,14648
C	Betina D. T.	30	2,7667	,43018	,07854
	Betina D. s.	30	2,8000	,40684	,07428
D	Betina D. T.	30	5,8667	,34575	,06312
	Betina D. s.	30	5,5667	,50401	,09202
E	Betina D. T.	30	12,4000	,72397	,13218
	Betina D. s.	30	12,5667	,85836	,15671
F	Betina D. T.	30	1,0000	,00000 <sup>a</sup>	0,00000
	Betina D. s.	30	1,0000	,00000 <sup>a</sup>	0,00000
G	Betina D. T.	30	7,6000	,49827	,09097
	Betina D. s.	30	7,5667	,50401	,09202
H	Betina D. T.	30	22,2333	,50401	,09202
	Betina D. s.	30	22,5000	,93772	,17120
I	Betina D. T.	30	10,0333	1,06620	,19466
	Betina D. s.	30	9,9000	1,37339	,25075
J	Betina D. T.	30	32,7000	1,26355	,23069
	Betina D. s.	30	32,1333	1,69651	,30974
K	Betina D. T.	30	8,2333	,67891	,12395
	Betina D. s.	30	8,3333	,71116	,12984
L	Betina D. T.	30	11,5667	,50401	,09202
	Betina D. s.	30	11,4000	,67466	,12318



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**Independent Samples Test**

	Levene's Test for Equality of Variances		t-test for Equality of Means							
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference		
								Lower	Upper	
A	8,164	,006	Equal variances assumed	-1,433	58	,157	-,16667	,11630	-,39946	,06613
			Equal variances not assumed	-1,433	56,098	,157	-,16667	,11630	-,39963	,06629
B	2,375	,129	Equal variances assumed	3,050	58	,003	,56667	,18580	,19475	,93858
			Equal variances not assumed	3,050	54,765	,004	,56667	,18580	,19428	,93905
C	,382	,539	Equal variances assumed	-,308	58	,759	-,03333	,10810	-,24972	,18305
			Equal variances not assumed	-,308	57,820	,759	-,03333	,10810	-,24974	,18307
D	29,476	,000	Equal variances assumed	2,688	58	,009	,30000	,11159	,07663	,52337
			Equal variances not assumed	2,688	51,346	,010	,30000	,11159	,07601	,52399
E	,638	,428	Equal variances assumed	-,813	58	,420	-,16667	,20501	-,57705	,24371
			Equal variances not assumed	-,813	56,396	,420	-,16667	,20501	-,57729	,24396
G	,256	,615	Equal variances assumed	,258	58	,798	,03333	,12940	-,22568	,29235
			Equal variances not assumed	,258	57,992	,798	,03333	,12940	-,22568	,29235

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	Levene's Test for Equality of Variances		t-test for Equality of Means							
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference		
								Lower	Upper	
H	Equal variances assumed	6,638	,013	-1,372	58	,175	-,26667	,19437	-,65573	,12240
	Equal variances not assumed			-1,372	44,465	,177	-,26667	,19437	-,65827	,12493
I	Equal variances assumed	3,802	,056	,420	58	,676	,13333	,31744	-,50209	,76875
	Equal variances not assumed			,420	54,642	,676	,13333	,31744	-,50292	,76959
J	Equal variances assumed	6,390	,014	1,467	58	,148	,56667	,38621	-,20641	1,33975
	Equal variances not assumed			1,467	53,603	,148	,56667	,38621	-,20777	1,34110
K	Equal variances assumed	,525	,472	-,557	58	,580	-,10000	,17951	-,45932	,25932
	Equal variances not assumed			-,557	57,876	,580	-,10000	,17951	-,45934	,25934
L	Equal variances assumed	4,076	,048	1,084	58	,283	,16667	,15375	-,14110	,47444
	Equal variances not assumed			1,084	53,682	,283	,16667	,15375	-,14163	,47496