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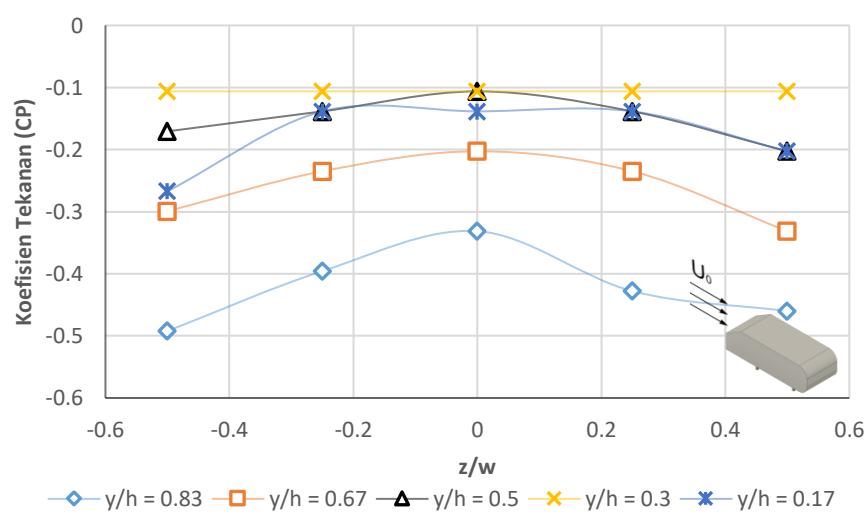
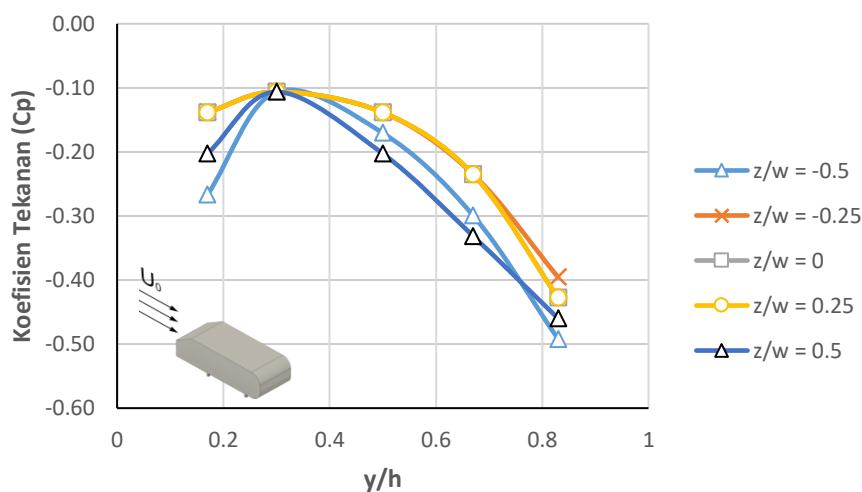
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LAMPIRAN

Lampiran 1 Tabel Dan Grafik Koefisien Tekanan (C_p) Tanpa Kontrol Aliran

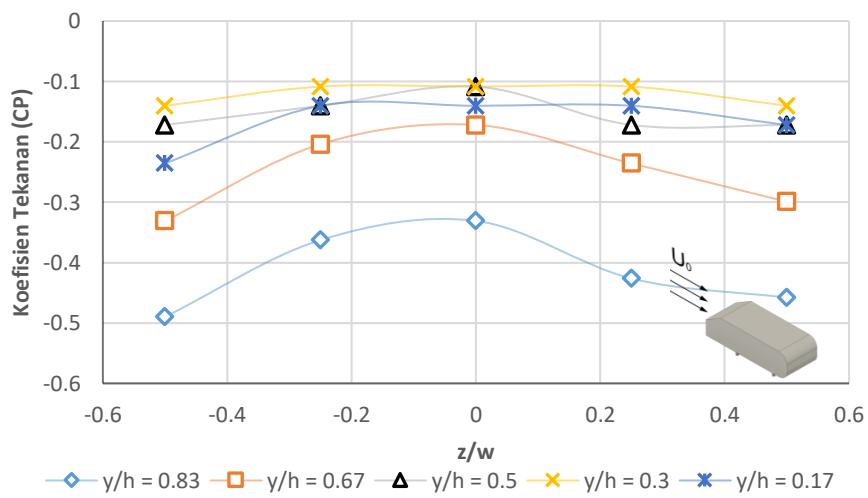
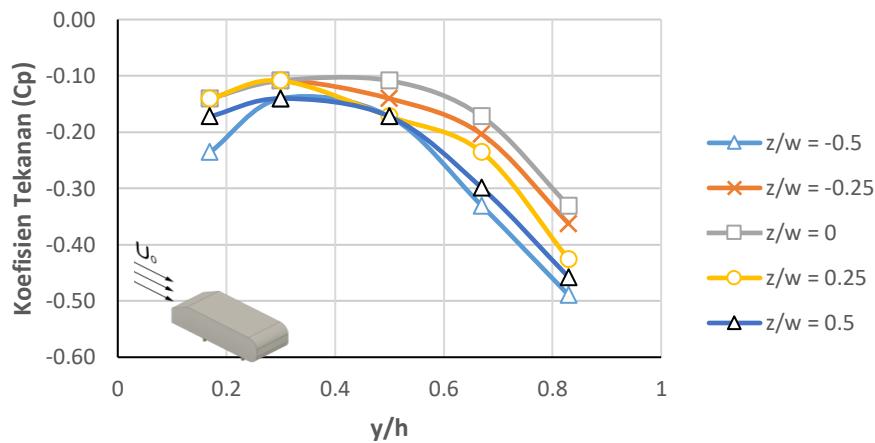
- Koefisien tekanan (C_p) tanpa kontrol aliran bagian belakang pada kecepatan *upstream* 11.1 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.492	-0.396	-0.331	-0.428	-0.460
0.67	-0.299	-0.235	-0.203	-0.235	-0.331
0.5	-0.171	-0.138	-0.106	-0.138	-0.203
0.3	-0.106	-0.106	-0.106	-0.106	-0.106
0.17	-0.267	-0.138	-0.138	-0.138	-0.203



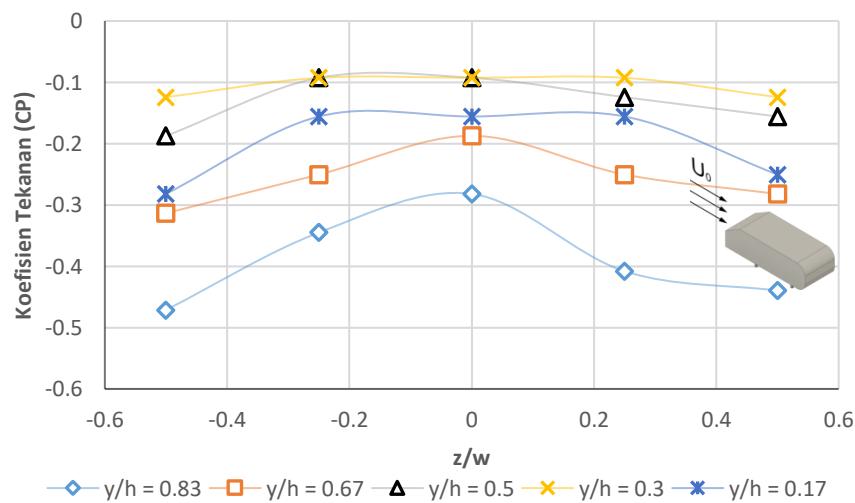
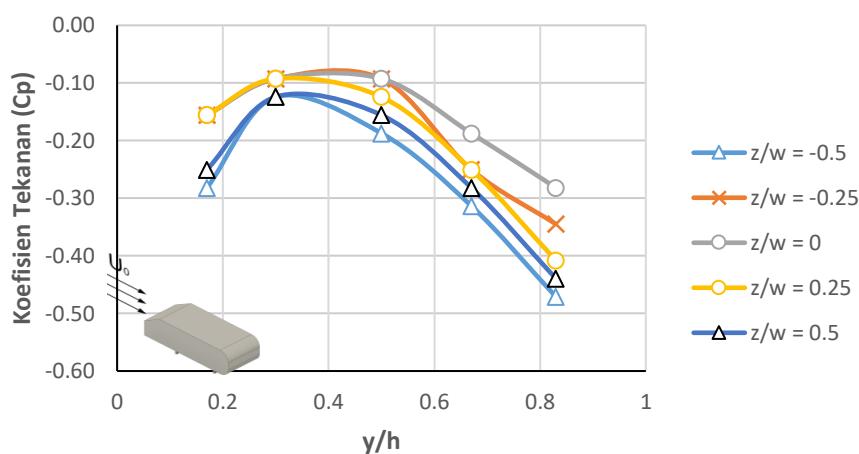
- Koefisien tekanan (C_p) tanpa kontrol aliran bagian belakang pada kecepatan *upstream* 13.9 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.490	-0.363	-0.331	-0.426	-0.458
0.67	-0.331	-0.204	-0.172	-0.236	-0.299
0.5	-0.172	-0.140	-0.109	-0.172	-0.172
0.3	-0.140	-0.109	-0.109	-0.109	-0.140
0.17	-0.236	-0.140	-0.140	-0.140	-0.172



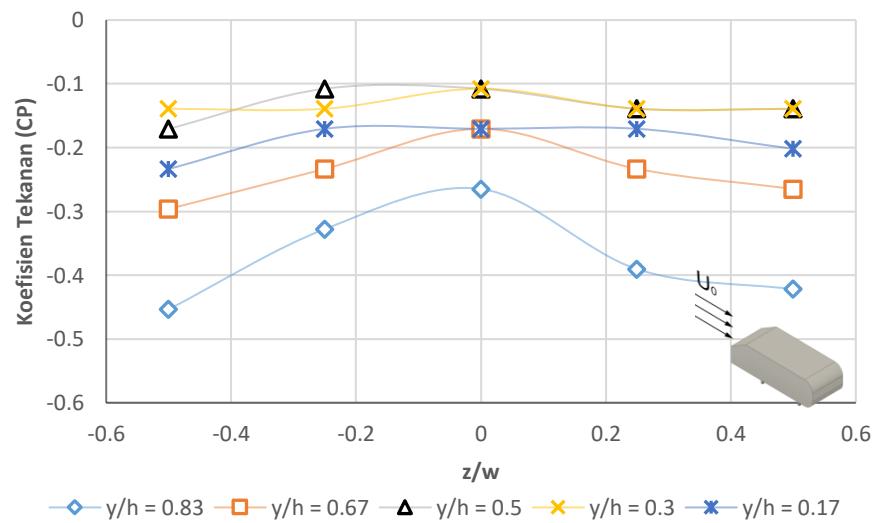
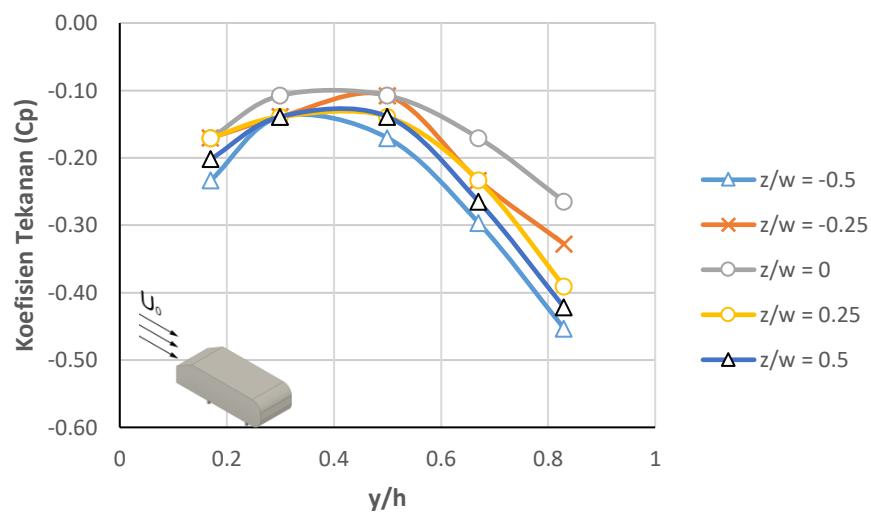
- Koefisien tekanan (C_p) tanpa kontrol aliran bagian belakang pada kecepatan *upstream* 16.7 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.471	-0.345	-0.282	-0.408	-0.440
0.67	-0.313	-0.250	-0.187	-0.250	-0.282
0.5	-0.187	-0.093	-0.093	-0.124	-0.156
0.3	-0.124	-0.093	-0.093	-0.093	-0.124
0.17	-0.282	-0.156	-0.156	-0.156	-0.250



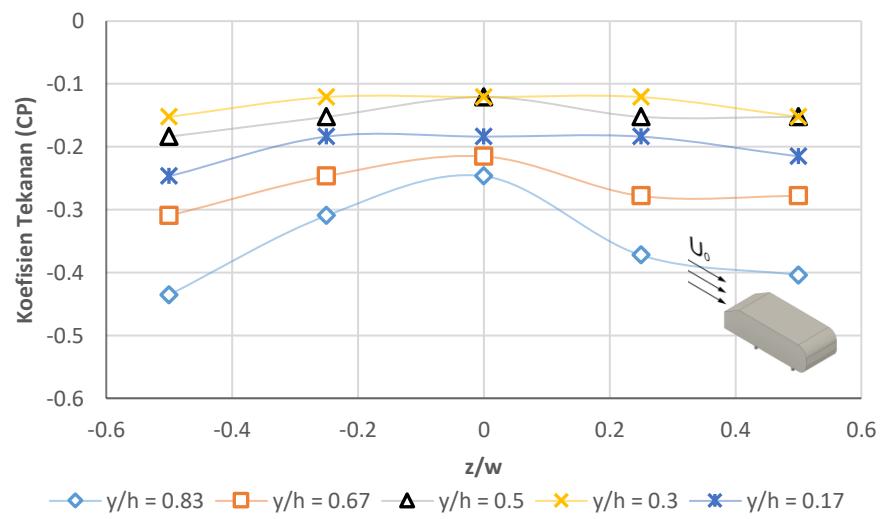
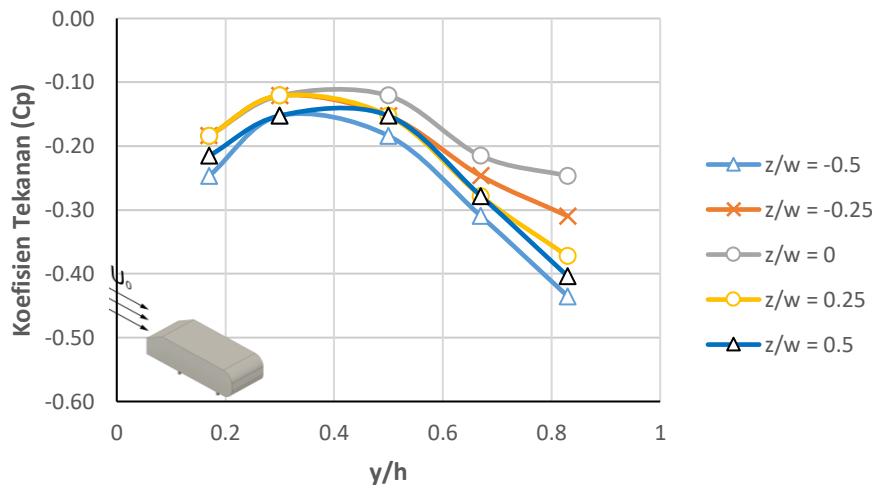
- Koefisien tekanan (C_p) tanpa kontrol aliran bagian belakang pada kecepatan *upstream* 19.4 m/s

y/h	Koefisien Tekanan (C_p)				
	z/w				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.453	-0.328	-0.265	-0.391	-0.422
0.67	-0.296	-0.233	-0.170	-0.233	-0.265
0.5	-0.170	-0.108	-0.108	-0.139	-0.139
0.3	-0.139	-0.139	-0.108	-0.139	-0.139
0.17	-0.233	-0.170	-0.170	-0.170	-0.202



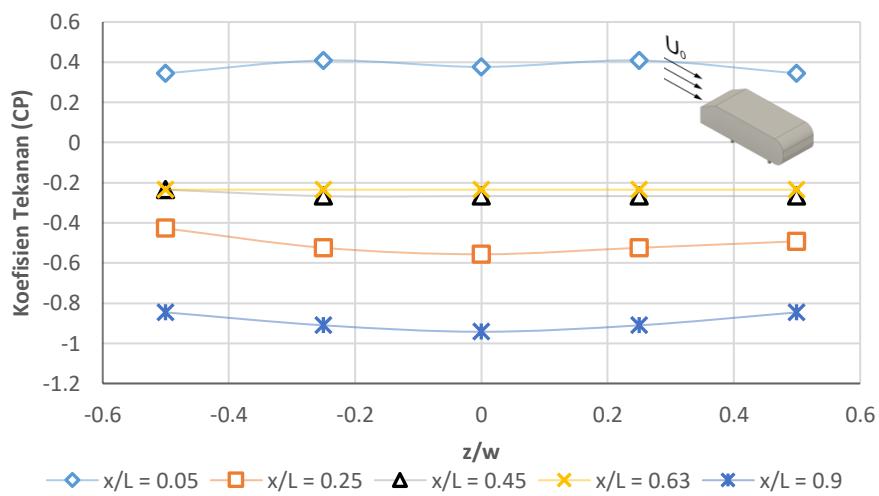
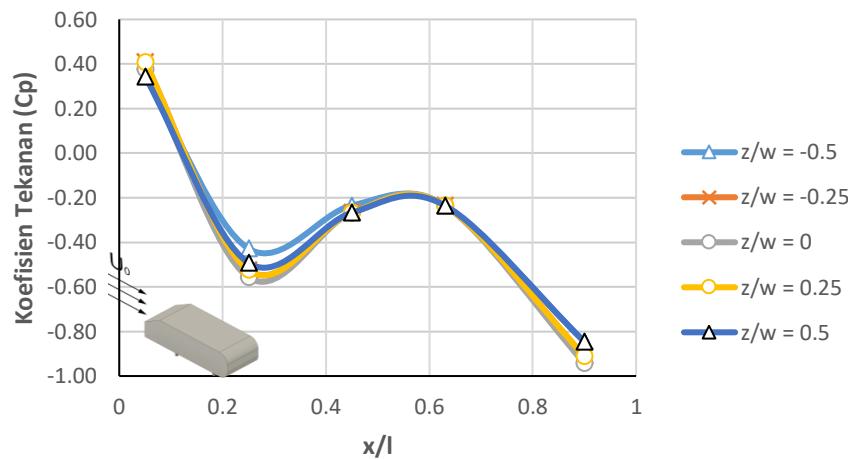
- Koefisien tekanan (C_p) tanpa kontrol aliran bagian belakang pada kecepatan *upstream* 22.2 m/s

y/h	Koefisien Tekanan (C_p)				
	z/w				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.435	-0.310	-0.247	-0.372	-0.404
0.67	-0.310	-0.247	-0.215	-0.278	-0.278
0.5	-0.184	-0.152	-0.121	-0.152	-0.152
0.3	-0.152	-0.121	-0.121	-0.121	-0.152
0.17	-0.247	-0.184	-0.184	-0.184	-0.215



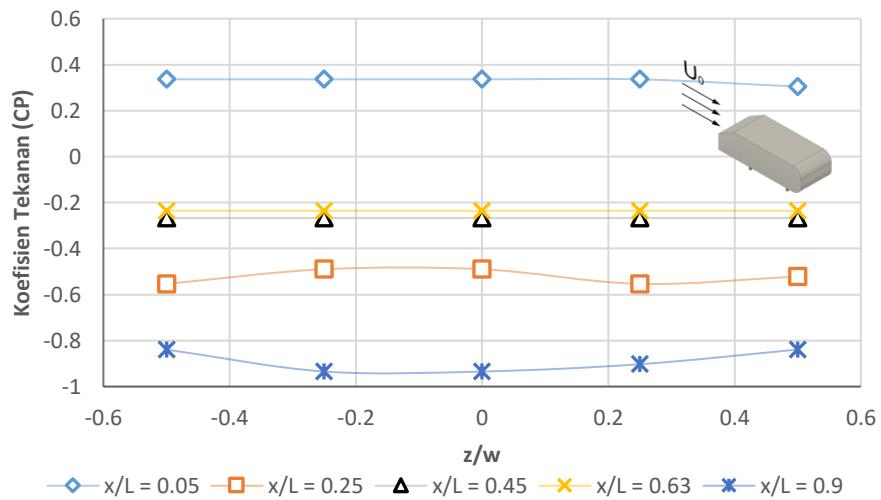
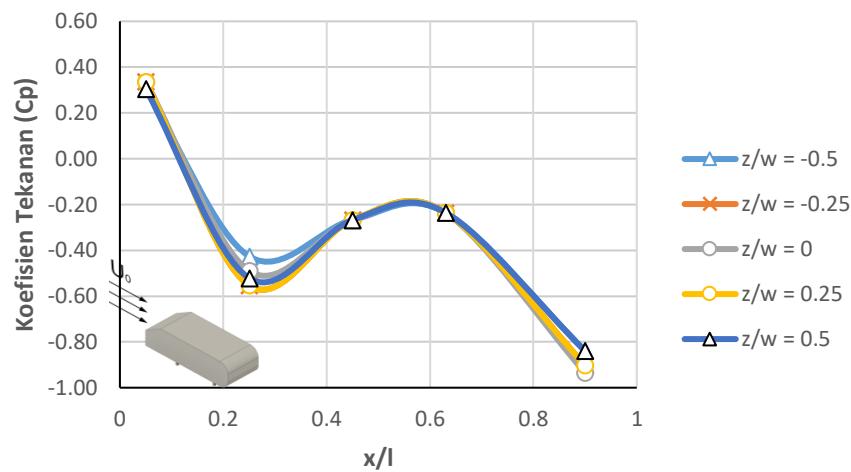
- Koefisien tekanan (C_p) tanpa kontrol aliran bagian atas pada kecepatan *upstream* 11.1 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.846	-0.910	-0.943	-0.910	-0.846
0.63	-0.235	-0.235	-0.235	-0.235	-0.235
0.45	-0.235	-0.267	-0.267	-0.267	-0.267
0.25	-0.428	-0.524	-0.557	-0.524	-0.492
0.05	0.344	0.408	0.376	0.408	0.344



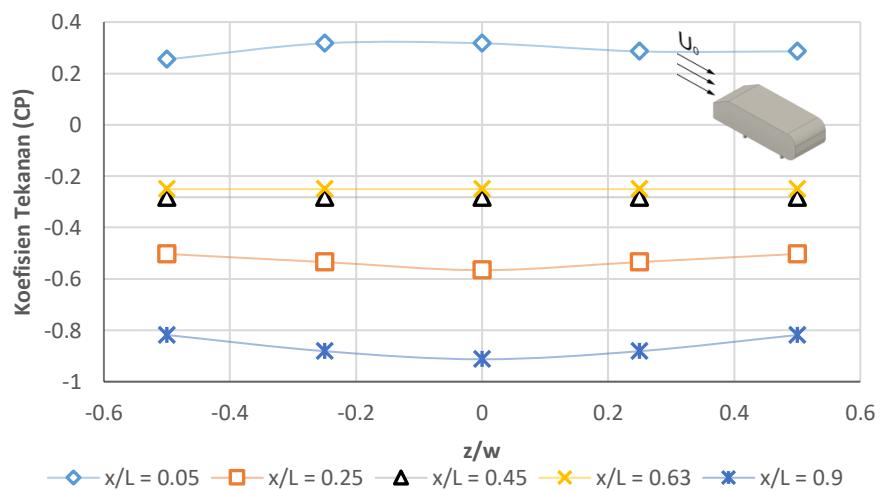
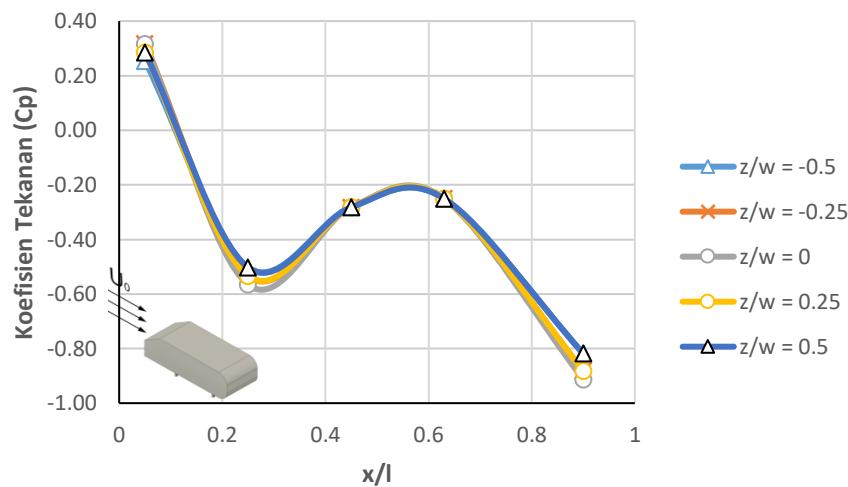
- Koefisien tekanan (C_p) tanpa kontrol aliran bagian atas pada kecepatan *upstream* 13.9 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.839	-0.903	-0.934	-0.903	-0.839
0.63	-0.236	-0.236	-0.236	-0.236	-0.236
0.45	-0.267	-0.267	-0.267	-0.267	-0.267
0.25	-0.426	-0.553	-0.490	-0.553	-0.522
0.05	0.304	0.336	0.336	0.336	0.304



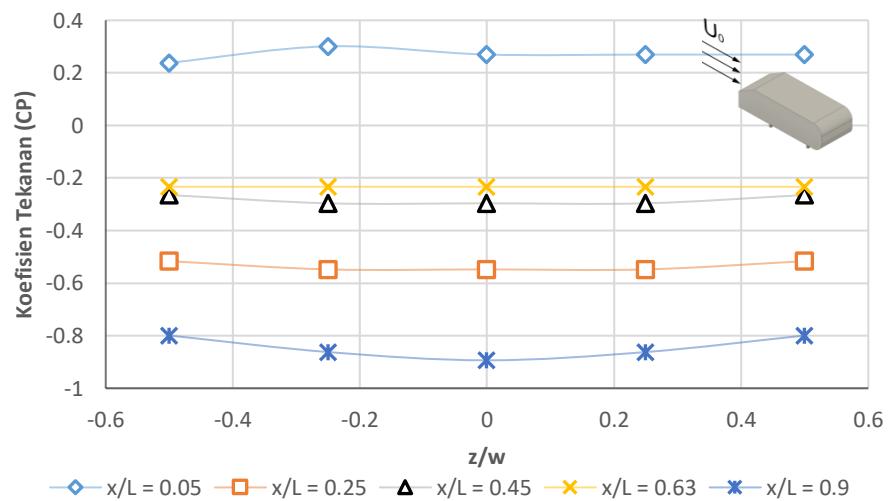
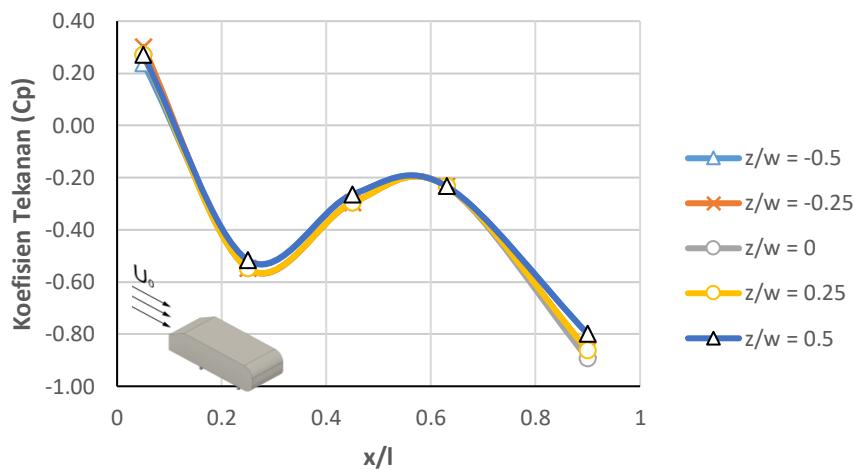
- Koefisien tekanan (C_p) tanpa kontrol aliran bagian atas pada kecepatan *upstream* 16.7 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.818	-0.881	-0.913	-0.881	-0.818
0.63	-0.250	-0.250	-0.250	-0.250	-0.250
0.45	-0.282	-0.282	-0.282	-0.282	-0.282
0.25	-0.503	-0.534	-0.566	-0.534	-0.503
0.05	0.254	0.317	0.317	0.286	0.286



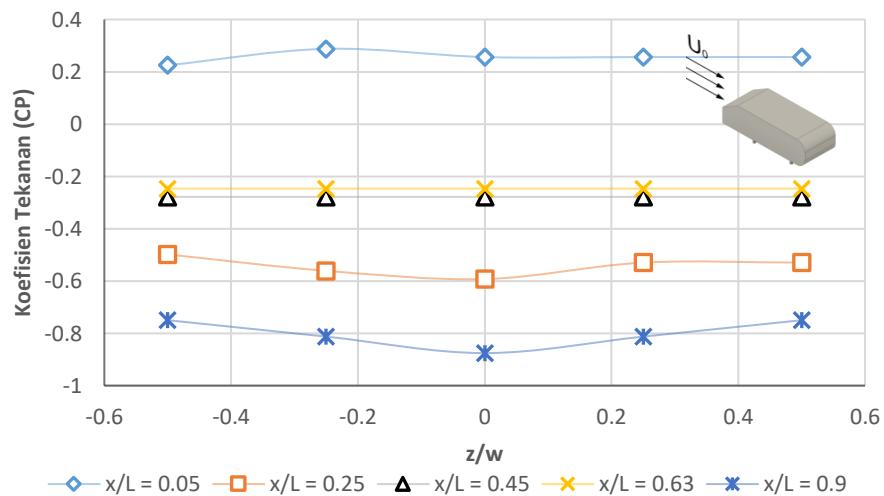
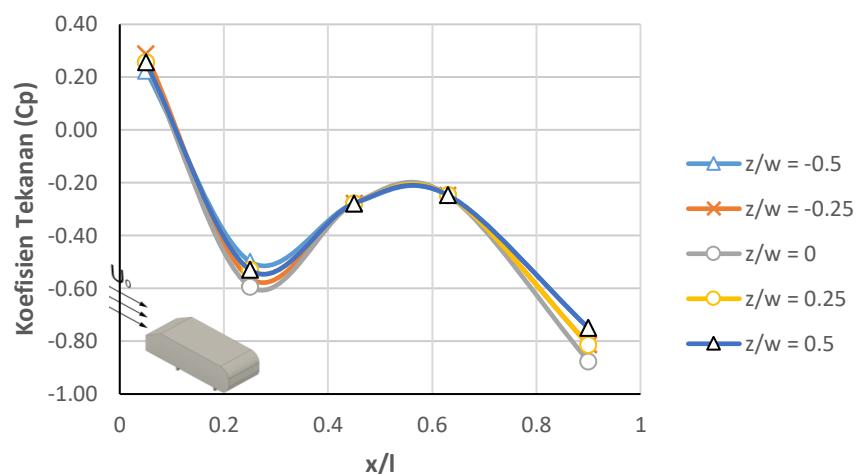
- Koefisien tekanan (C_p) tanpa kontrol aliran bagian atas pada kecepatan *upstream* 19.4 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.799	-0.862	-0.894	-0.862	-0.799
0.63	-0.233	-0.233	-0.233	-0.233	-0.233
0.45	-0.265	-0.296	-0.296	-0.296	-0.265
0.25	-0.516	-0.548	-0.548	-0.548	-0.516
0.05	0.238	0.301	0.270	0.270	0.270



- Koefisien tekanan (C_p) tanpa kontrol aliran bagian atas pada kecepatan upstream 22.2 m/s

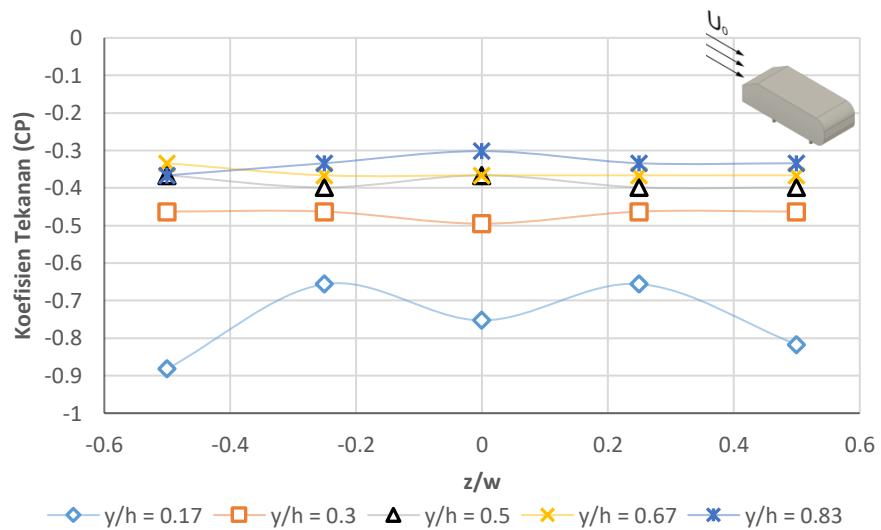
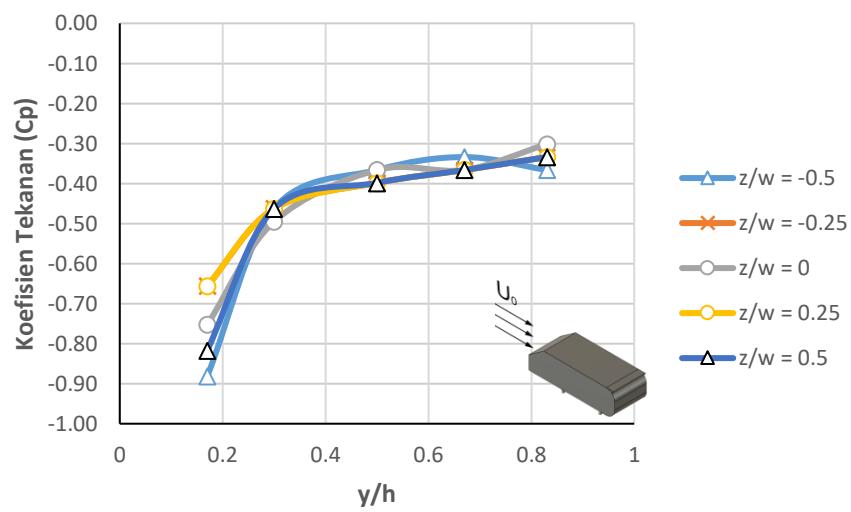
x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.750	-0.813	-0.876	-0.813	-0.750
0.63	-0.247	-0.247	-0.247	-0.247	-0.247
0.45	-0.278	-0.278	-0.278	-0.278	-0.278
0.25	-0.498	-0.561	-0.593	-0.530	-0.530
0.05	0.225	0.288	0.256	0.256	0.256



Lampiran 2 Tabel Dan Grafik Koefisien Tekanan (C_p) Spoiler

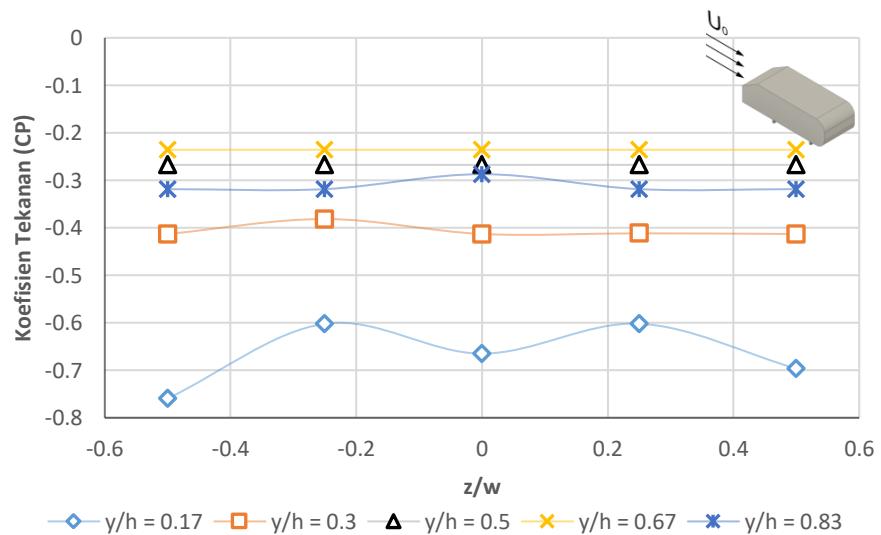
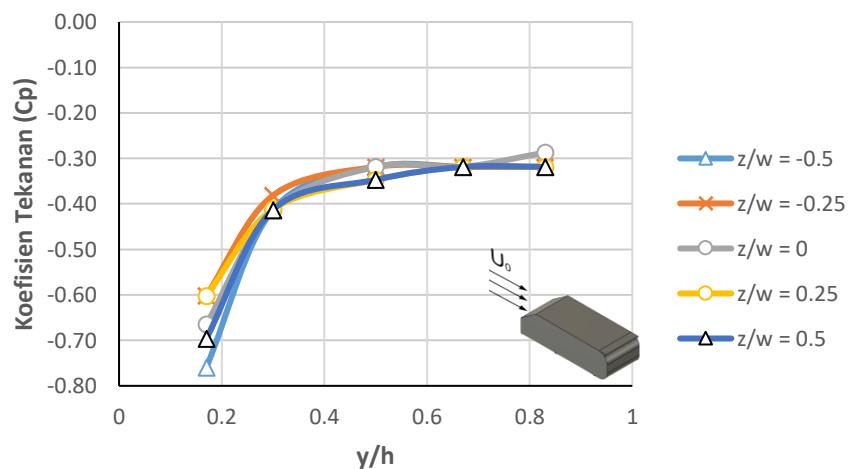
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *spoiler* pada kecepatan *upstream* 11.1 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.366	-0.334	-0.302	-0.334	-0.334
0.67	-0.334	-0.366	-0.366	-0.366	-0.366
0.5	-0.366	-0.398	-0.366	-0.398	-0.398
0.3	-0.463	-0.463	-0.495	-0.463	-0.463
0.17	-0.882	-0.656	-0.753	-0.656	-0.817



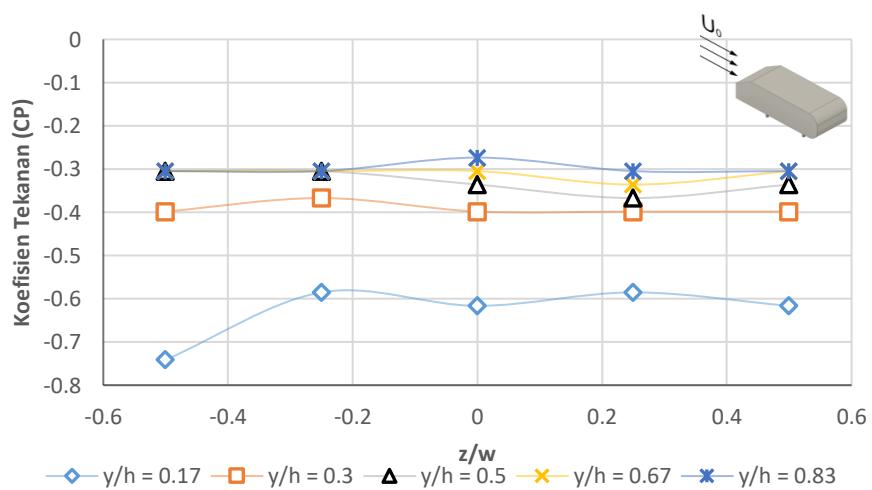
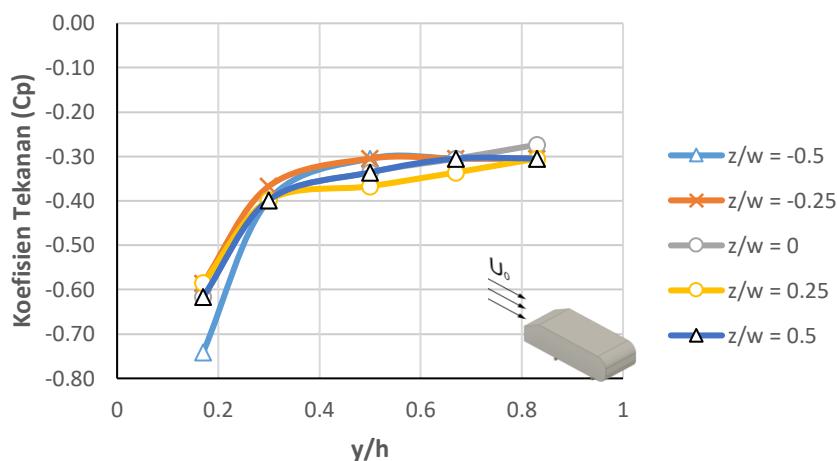
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *spoiler* pada kecepatan *upstream* 13.9 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.319	-0.319	-0.287	-0.319	-0.319
0.67	-0.319	-0.319	-0.319	-0.319	-0.319
0.5	-0.319	-0.319	-0.319	-0.347	-0.347
0.3	-0.413	-0.382	-0.413	-0.412	-0.413
0.17	-0.759	-0.602	-0.665	-0.602	-0.696



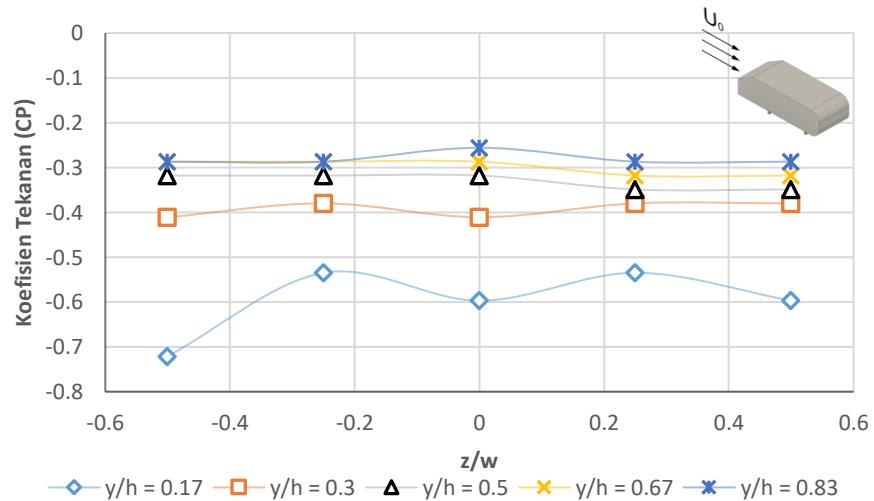
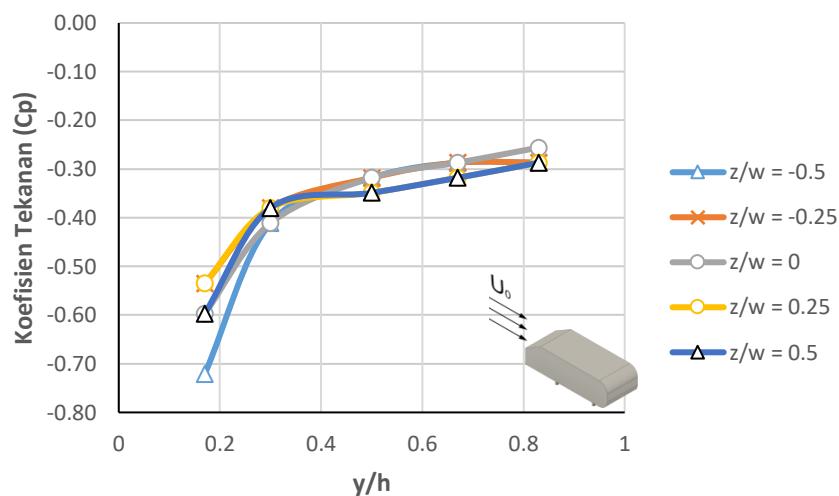
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *spoiler* pada kecepatan *upstream* 16.7 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.305	-0.305	-0.274	-0.305	-0.305
0.67	-0.305	-0.305	-0.305	-0.336	-0.305
0.5	-0.305	-0.305	-0.336	-0.367	-0.336
0.3	-0.398	-0.367	-0.398	-0.398	-0.398
0.17	-0.741	-0.585	-0.616	-0.585	-0.616



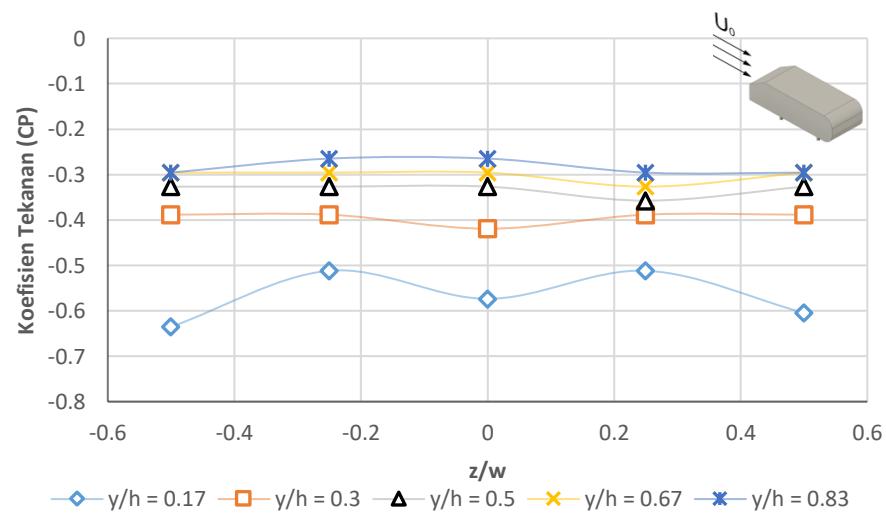
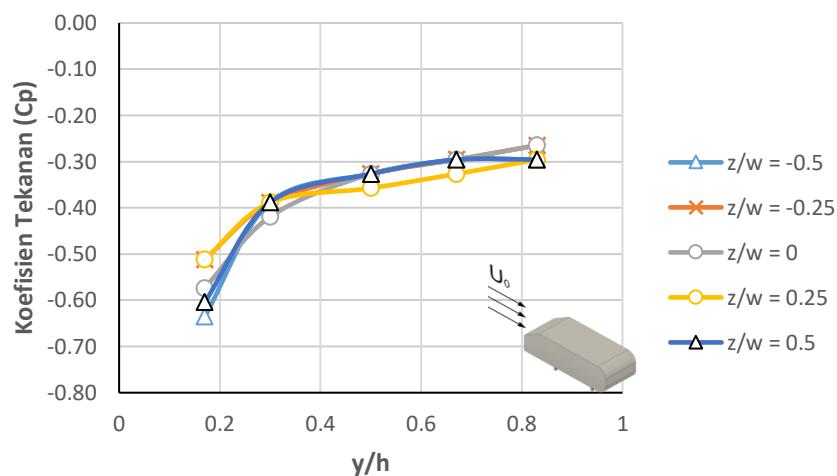
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *spoiler* pada kecepatan *upstream* 19.4 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.287	-0.287	-0.256	-0.287	-0.287
0.67	-0.287	-0.287	-0.287	-0.318	-0.318
0.5	-0.318	-0.318	-0.318	-0.349	-0.349
0.3	-0.411	-0.380	-0.411	-0.380	-0.380
0.17	-0.721	-0.535	-0.597	-0.535	-0.597



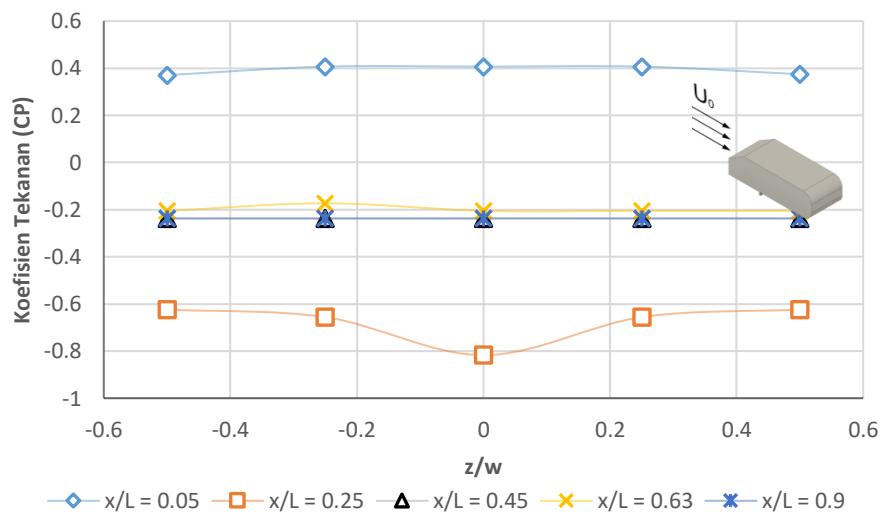
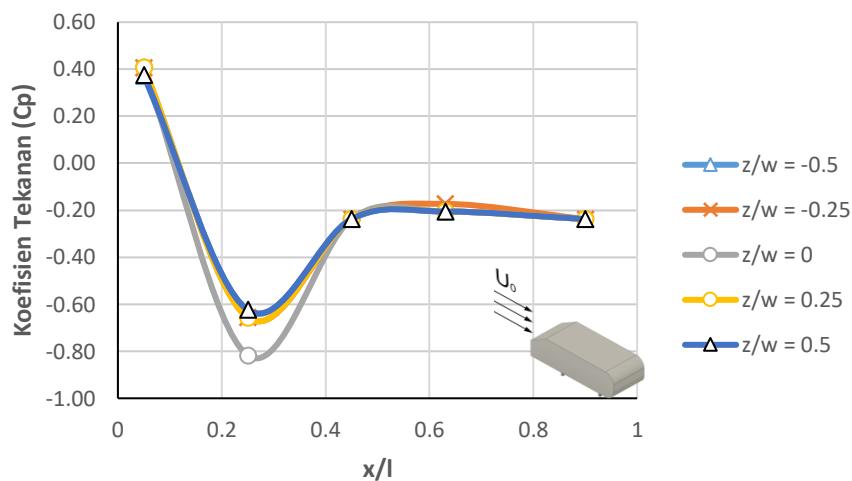
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *spoiler* pada kecepatan *upstream* 22.2 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.296	-0.265	-0.265	-0.296	-0.296
0.67	-0.296	-0.296	-0.296	-0.327	-0.296
0.5	-0.327	-0.327	-0.327	-0.357	-0.327
0.3	-0.388	-0.388	-0.419	-0.388	-0.388
0.17	-0.635	-0.512	-0.574	-0.512	-0.604



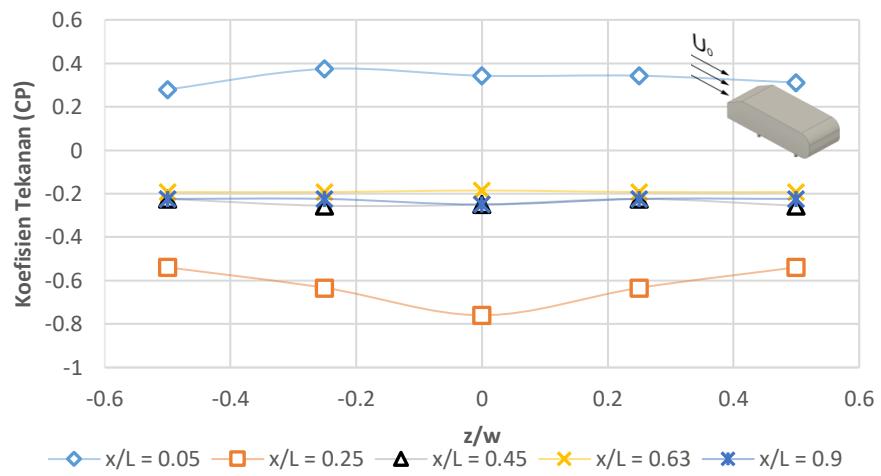
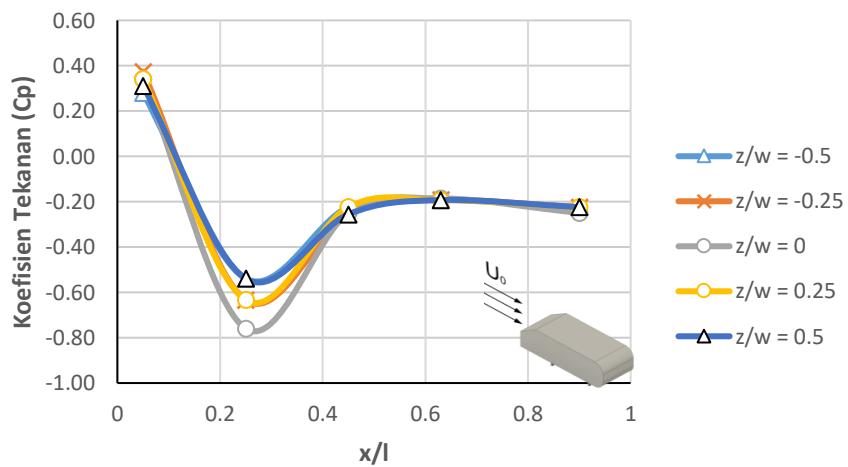
- Koefisien tekanan (C_p) bagian atas dengan penambahan *spoiler* pada kecepatan *upstream* 11.1 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.237	-0.237	-0.237	-0.237	-0.237
0.63	-0.205	-0.173	-0.205	-0.205	-0.205
0.45	-0.237	-0.237	-0.237	-0.237	-0.237
0.25	-0.624	-0.656	-0.817	-0.656	-0.624
0.05	0.371	0.407	0.407	0.407	0.374



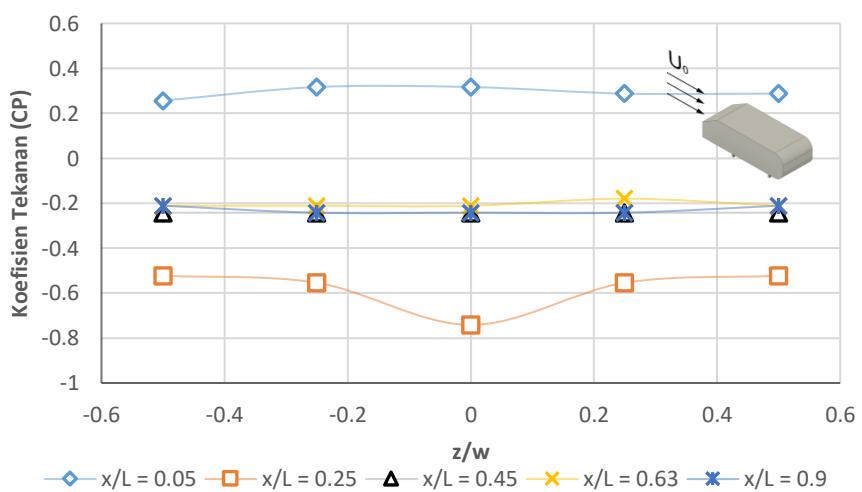
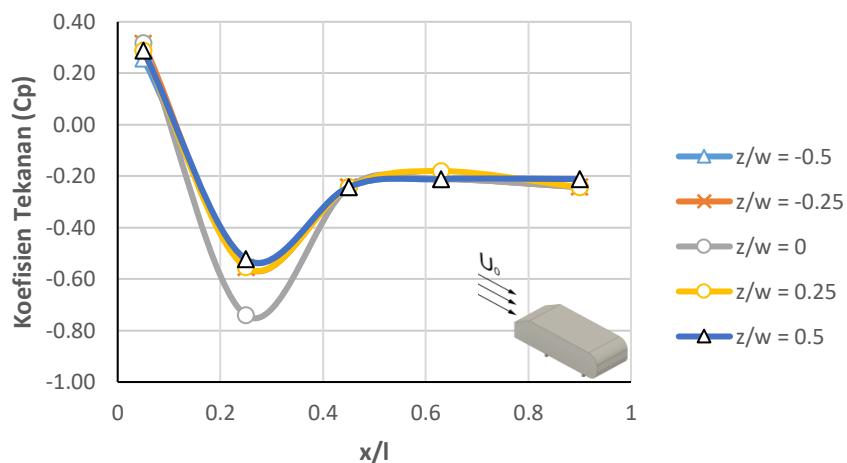
- Koefisien tekanan (C_p) bagian atas dengan penambahan *spoiler* pada kecepatan *upstream* 13.9 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.224	-0.224	-0.250	-0.224	-0.224
0.63	-0.193	-0.193	-0.185	-0.193	-0.193
0.45	-0.224	-0.256	-0.250	-0.224	-0.256
0.25	-0.539	-0.633	-0.759	-0.633	-0.539
0.05	0.280	0.374	0.343	0.343	0.311



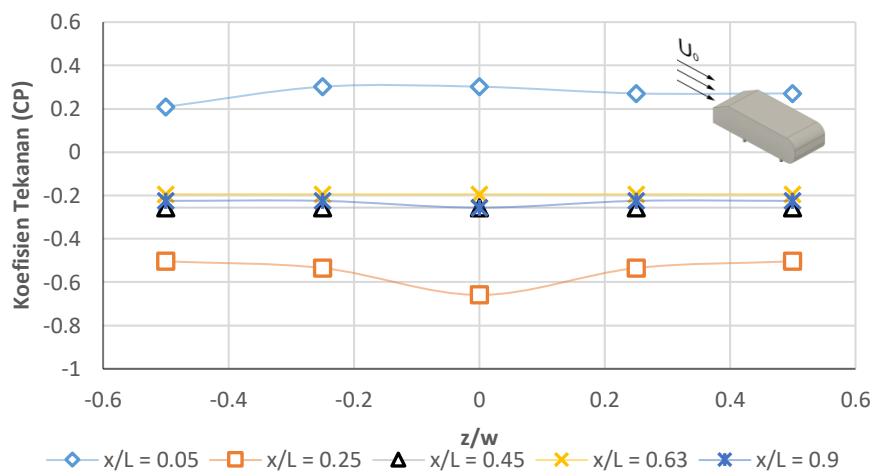
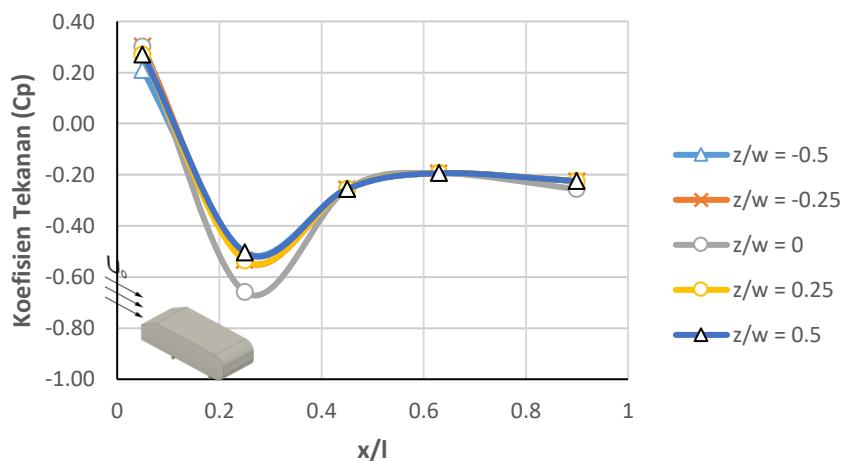
- Koefisien tekanan (C_p) bagian atas dengan penambahan *spoiler* pada kecepatan upstream 16.7 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.211	-0.242	-0.242	-0.242	-0.211
0.63	-0.211	-0.211	-0.211	-0.180	-0.211
0.45	-0.242	-0.242	-0.242	-0.242	-0.242
0.25	-0.523	-0.554	-0.741	-0.554	-0.523
0.05	0.256	0.317	0.317	0.288	0.288



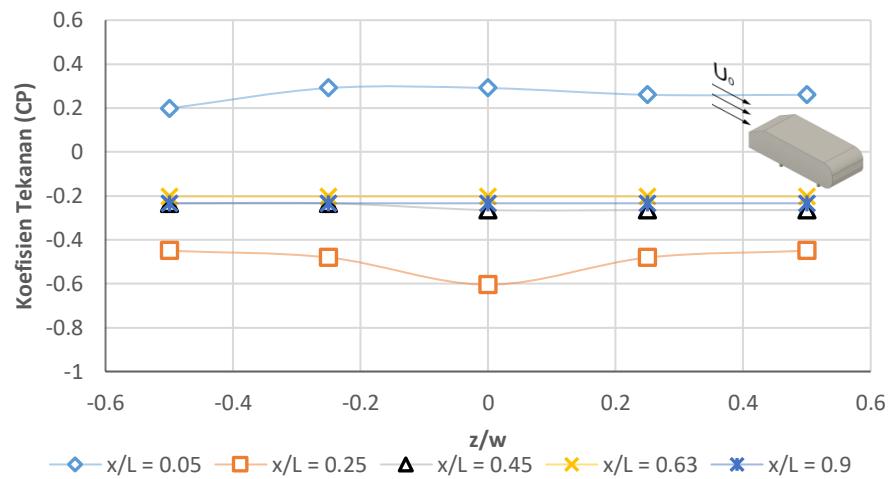
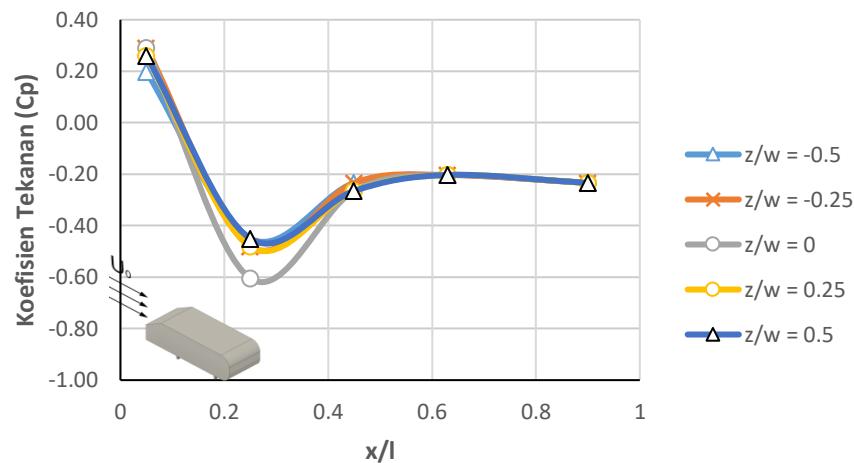
- Koefisien tekanan (C_p) bagian atas dengan penambahan *spoiler* pada kecepatan *upstream* 19.4 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.225	-0.225	-0.256	-0.225	-0.225
0.63	-0.194	-0.194	-0.194	-0.194	-0.194
0.45	-0.256	-0.256	-0.256	-0.256	-0.256
0.25	-0.504	-0.535	-0.659	-0.535	-0.504
0.05	0.209	0.302	0.302	0.271	0.271



- Koefisien tekanan (C_p) bagian atas dengan penambahan spoiler pada kecepatan upstream 22.2 m/s

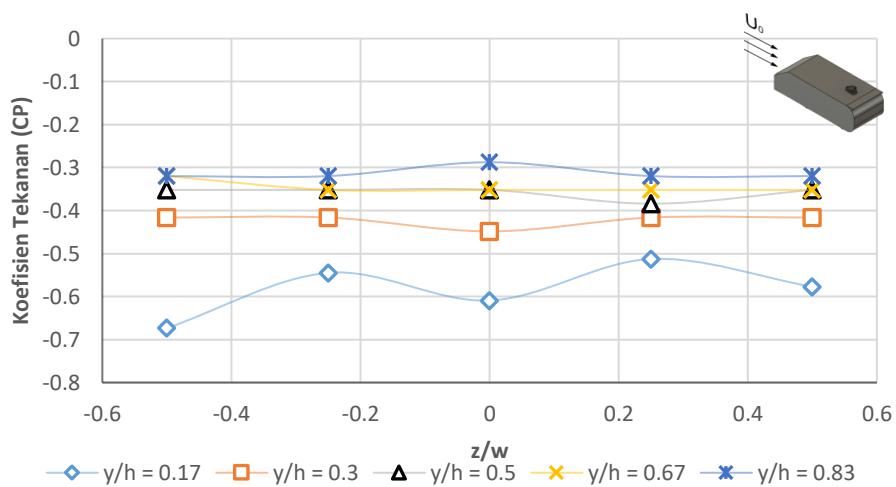
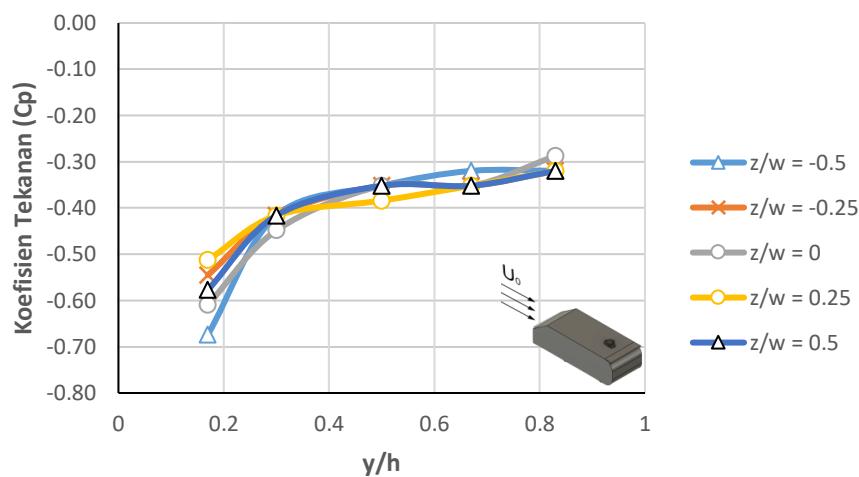
x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.234	-0.234	-0.234	-0.234	-0.234
0.63	-0.203	-0.203	-0.203	-0.203	-0.203
0.45	-0.234	-0.234	-0.265	-0.265	-0.265
0.25	-0.450	-0.481	-0.604	-0.481	-0.450
0.05	0.198	0.291	0.291	0.260	0.260



Lampiran 3 Tabel Dan Grafik Koefisien Tekanan (C_p)) *Fin 1* dan *Spoiler*

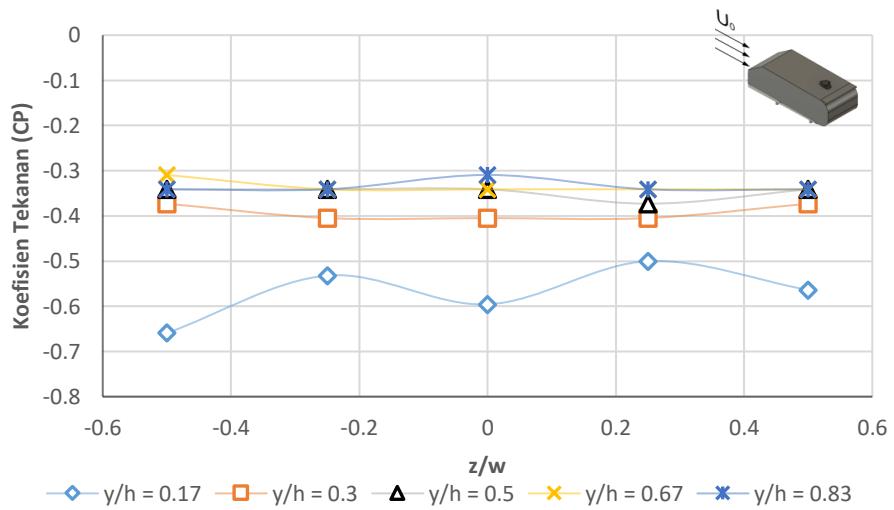
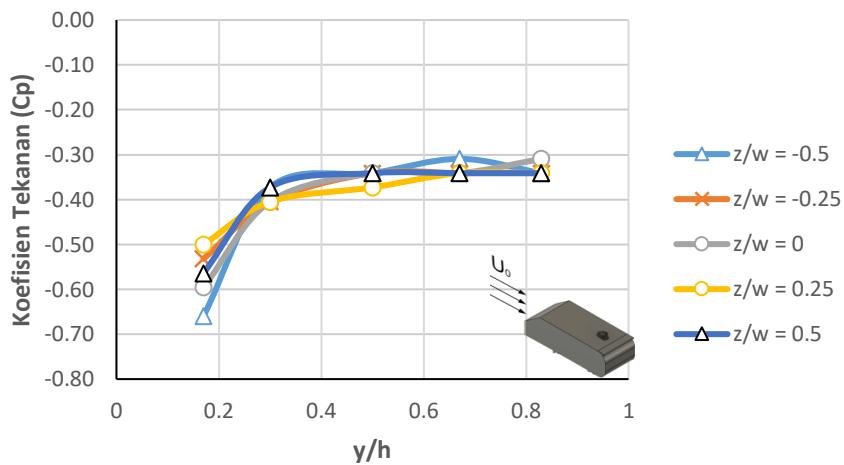
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 1* dan *spoiler* pada kecepatan *upstream* 11.1 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.320	-0.320	-0.288	-0.320	-0.320
0.67	-0.320	-0.352	-0.352	-0.352	-0.352
0.5	-0.352	-0.352	-0.352	-0.384	-0.352
0.3	-0.416	-0.416	-0.448	-0.416	-0.416
0.17	-0.673	-0.545	-0.609	-0.513	-0.577



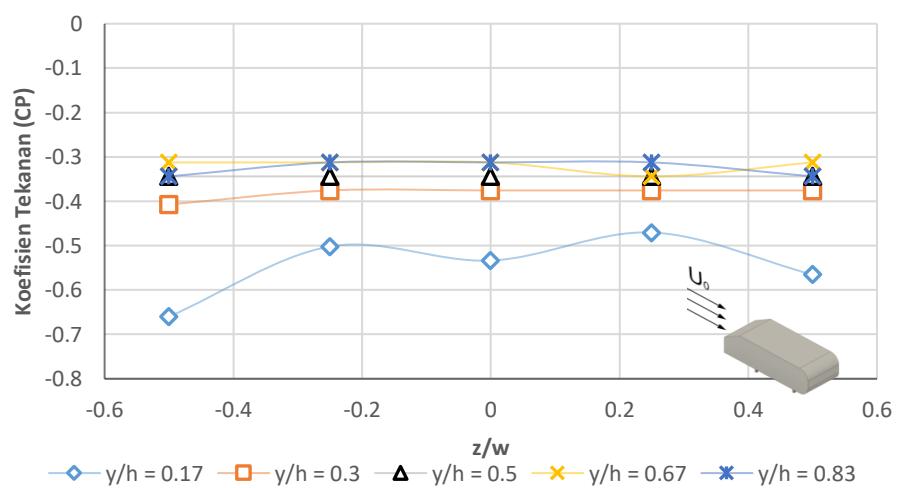
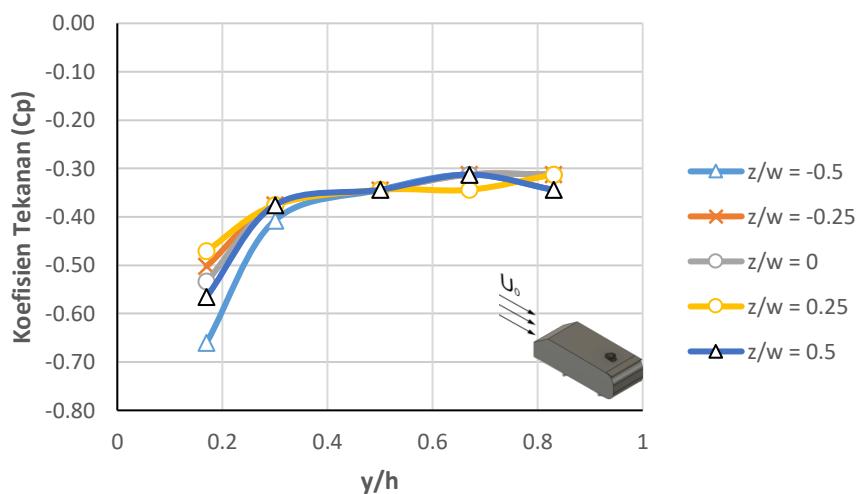
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 1* dan *spoiler* pada kecepatan *upstream* 13.9 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.341	-0.341	-0.309	-0.341	-0.341
0.67	-0.309	-0.341	-0.341	-0.341	-0.341
0.5	-0.341	-0.341	-0.341	-0.373	-0.341
0.3	-0.373	-0.405	-0.405	-0.405	-0.373
0.17	-0.659	-0.532	-0.596	-0.500	-0.564



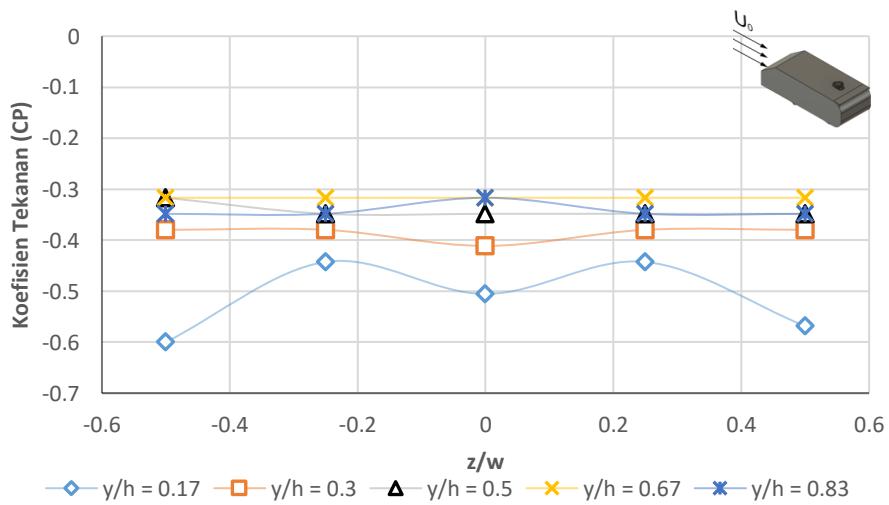
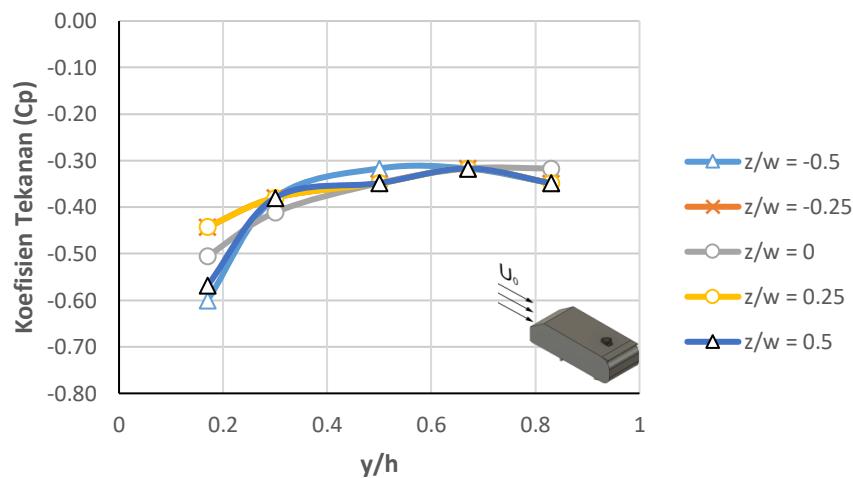
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 1* dan *spoiler* pada kecepatan upstream 16.7 m/s

y/h	Koefisien Tekanan (C_p)				
	z/w				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.344	-0.312	-0.312	-0.312	-0.344
0.67	-0.312	-0.312	-0.312	-0.344	-0.312
0.5	-0.344	-0.344	-0.344	-0.344	-0.344
0.3	-0.407	-0.376	-0.376	-0.376	-0.376
0.17	-0.660	-0.502	-0.534	-0.470	-0.565



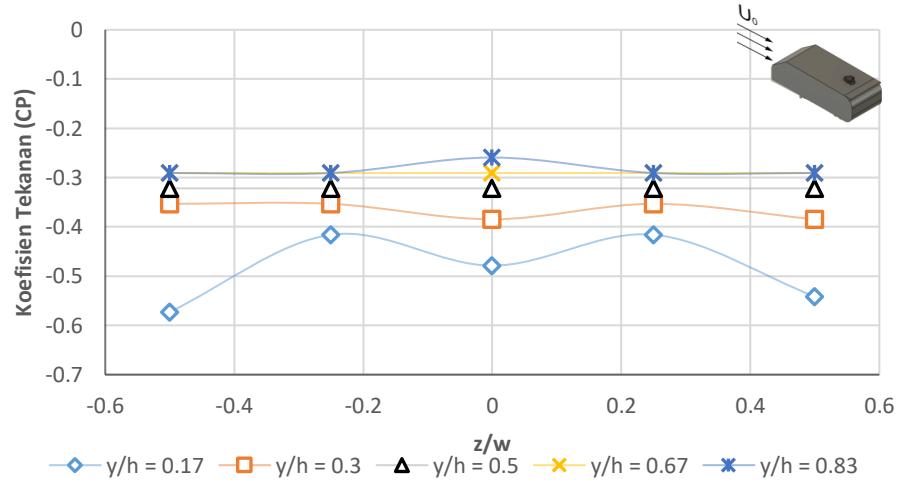
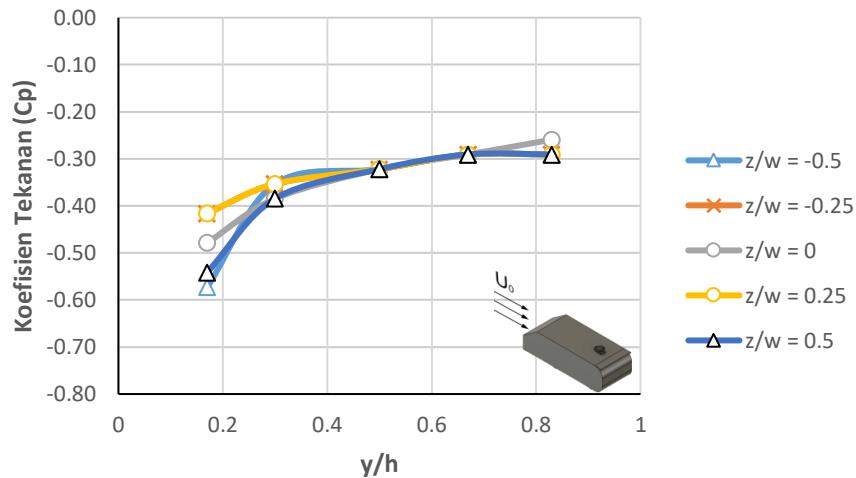
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 1* dan *spoiler* pada kecepatan upstream 19.4 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.348	-0.348	-0.317	-0.348	-0.348
0.67	-0.317	-0.317	-0.317	-0.317	-0.317
0.5	-0.317	-0.348	-0.348	-0.348	-0.348
0.3	-0.380	-0.380	-0.411	-0.380	-0.380
0.17	-0.600	-0.443	-0.506	-0.443	-0.568



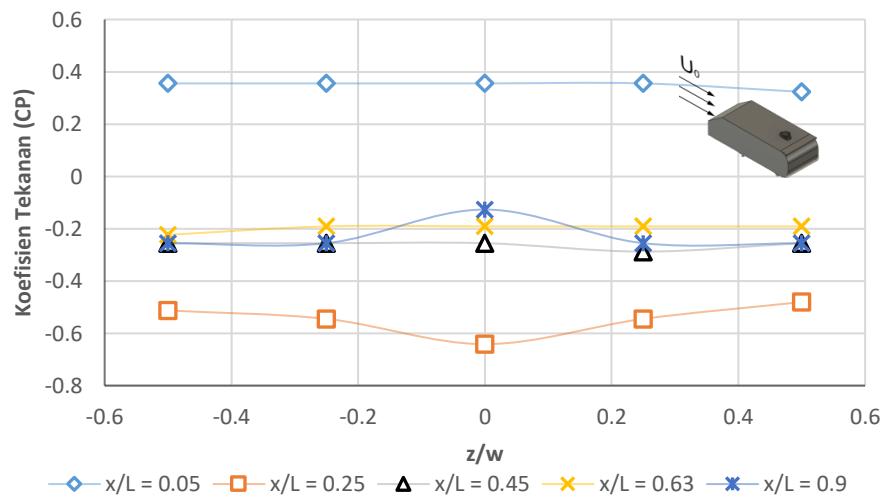
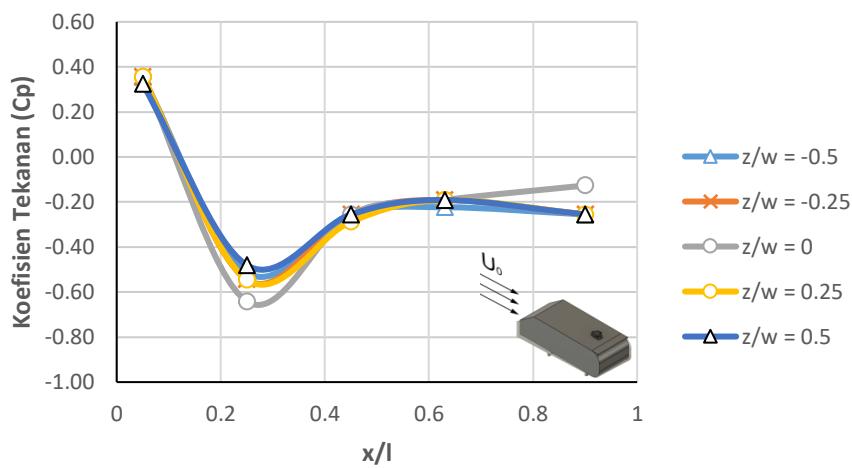
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 1* dan *spoiler* pada kecepatan upstream 22.2 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.291	-0.291	-0.259	-0.291	-0.291
0.67	-0.291	-0.291	-0.291	-0.291	-0.291
0.5	-0.322	-0.322	-0.322	-0.322	-0.322
0.3	-0.353	-0.353	-0.385	-0.353	-0.385
0.17	-0.573	-0.416	-0.479	-0.416	-0.541



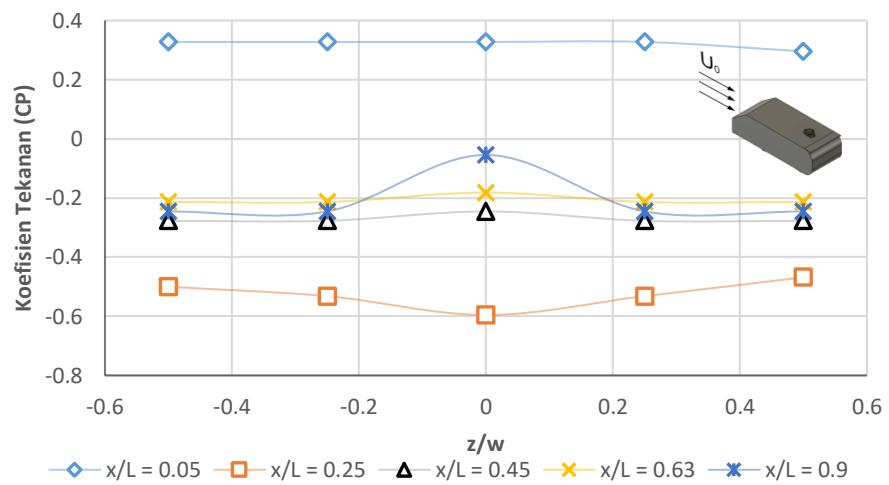
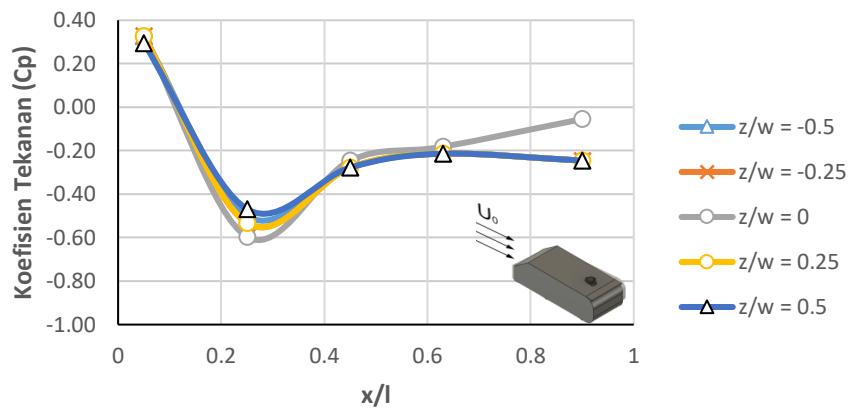
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 1* dan *spoiler* pada kecepatan *upstream* 11.1 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.255	-0.255	-0.127	-0.255	-0.255
0.63	-0.223	-0.191	-0.191	-0.191	-0.191
0.45	-0.255	-0.255	-0.255	-0.288	-0.255
0.25	-0.513	-0.545	-0.641	-0.545	-0.481
0.05	0.356	0.356	0.356	0.356	0.323



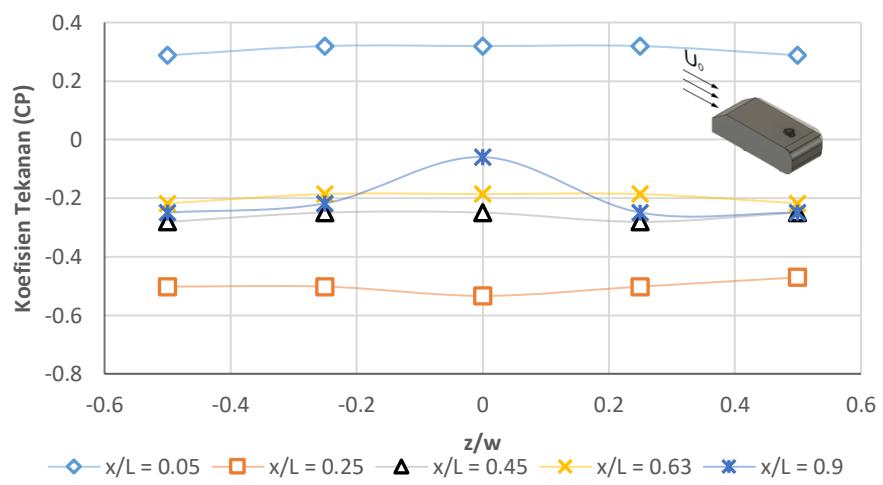
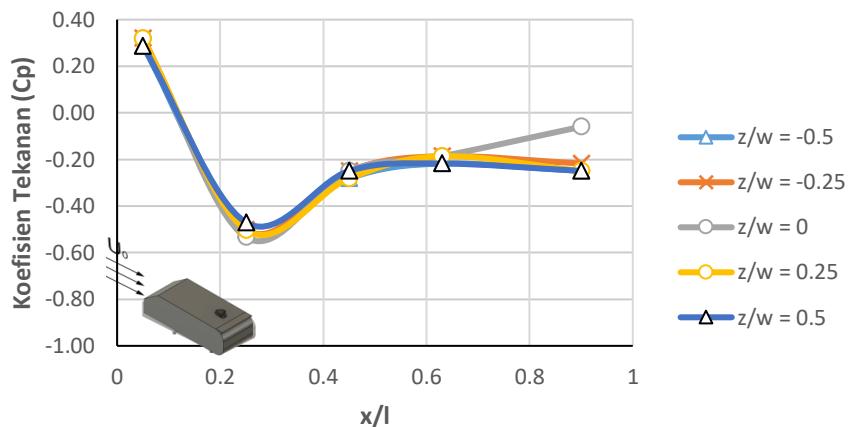
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 1* dan *spoiler* pada kecepatan *upstream* 13.9 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.246	-0.246	-0.055	-0.246	-0.246
0.63	-0.214	-0.214	-0.182	-0.214	-0.214
0.45	-0.277	-0.277	-0.246	-0.277	-0.277
0.25	-0.500	-0.532	-0.596	-0.532	-0.468
0.05	0.327	0.327	0.327	0.327	0.295



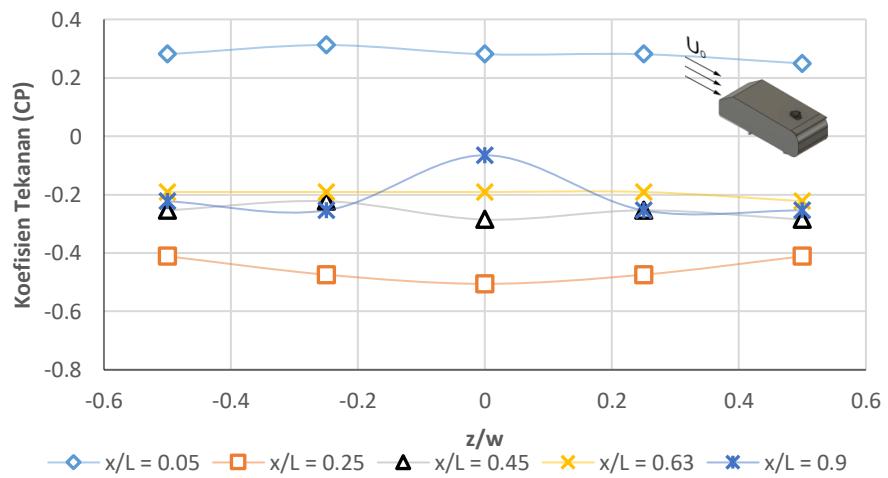
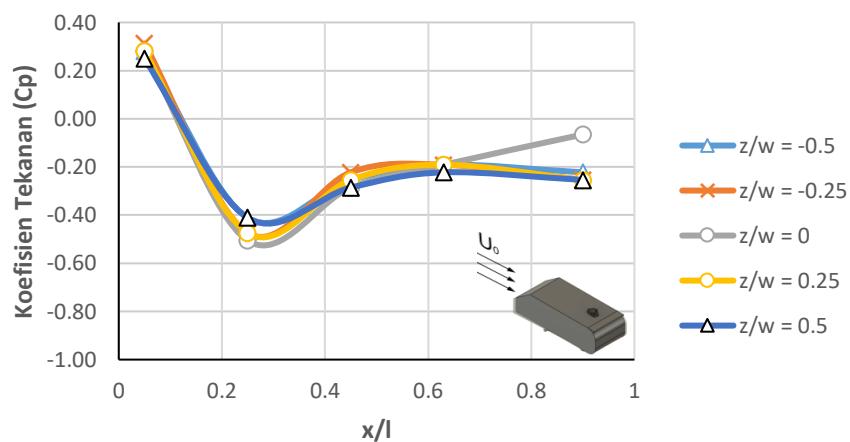
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 1* dan *spoiler* pada kecepatan *upstream* 16.7 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.249	-0.218	-0.060	-0.249	-0.249
0.63	-0.218	-0.186	-0.186	-0.186	-0.218
0.45	-0.281	-0.249	-0.249	-0.281	-0.249
0.25	-0.502	-0.502	-0.534	-0.502	-0.470
0.05	0.288	0.320	0.320	0.320	0.288



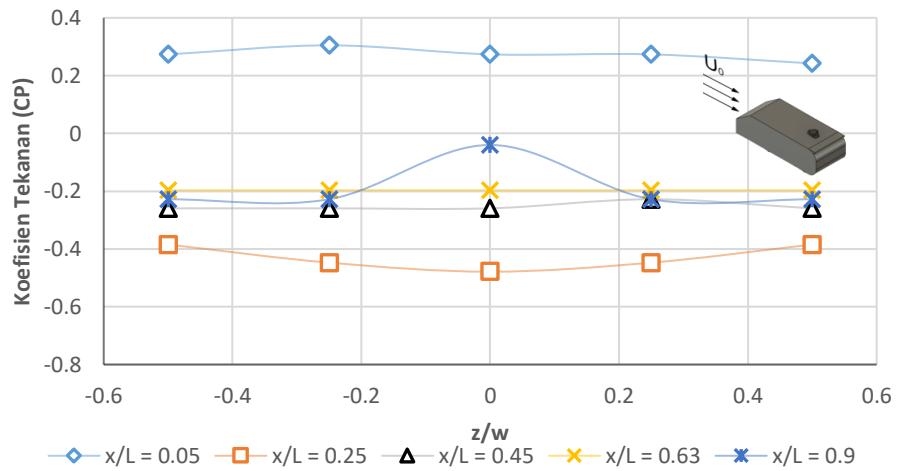
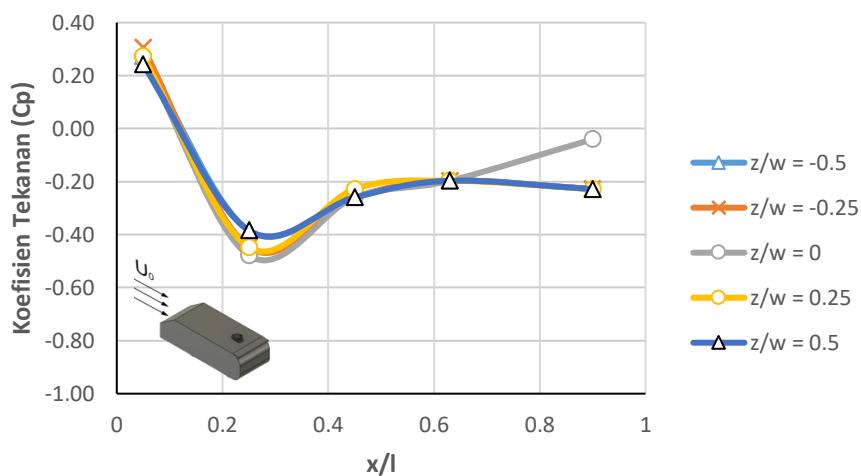
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 1* dan *spoiler* pada kecepatan *upstream* 19.4 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.222	-0.254	-0.065	-0.254	-0.254
0.63	-0.191	-0.191	-0.191	-0.191	-0.222
0.45	-0.254	-0.222	-0.285	-0.254	-0.285
0.25	-0.411	-0.474	-0.506	-0.474	-0.411
0.05	0.281	0.312	0.281	0.281	0.249



- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 1* dan *spoiler* pada kecepatan *upstream* 22.2 m/s

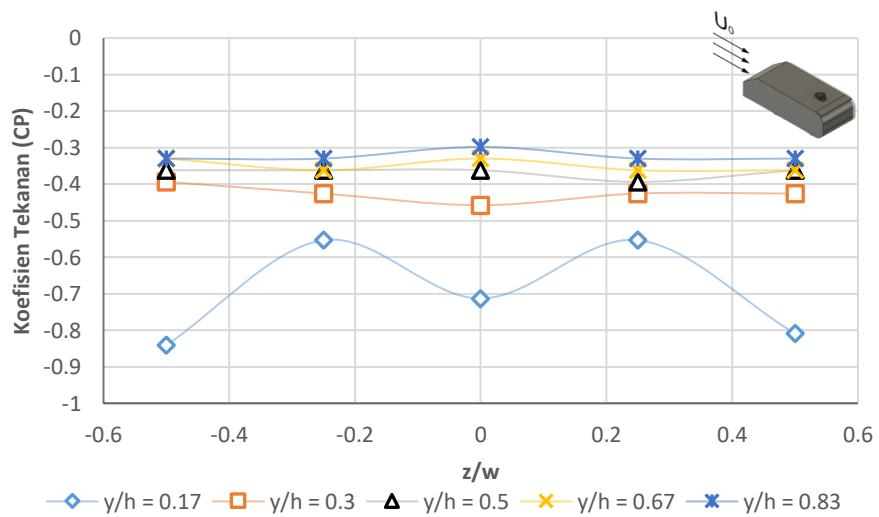
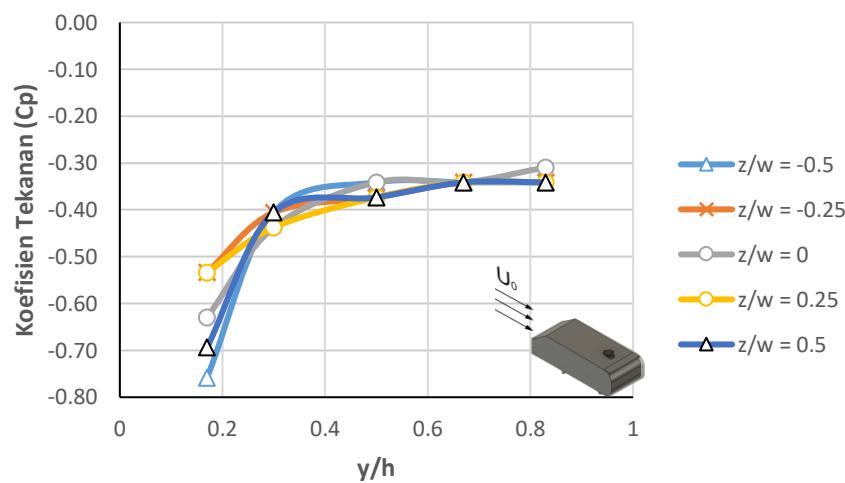
x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.228	-0.228	-0.040	-0.228	-0.228
0.63	-0.197	-0.197	-0.197	-0.197	-0.197
0.45	-0.259	-0.259	-0.259	-0.228	-0.259
0.25	-0.385	-0.447	-0.479	-0.447	-0.385
0.05	0.273	0.305	0.273	0.273	0.242



Lampiran 4 Tabel Dan Grafik Koefisien Tekanan (C_p) Fin 2 dan Spoiler

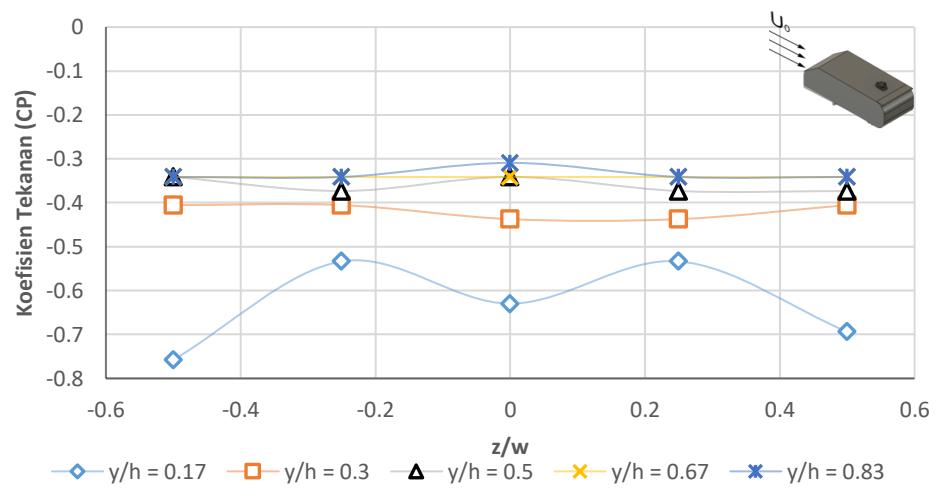
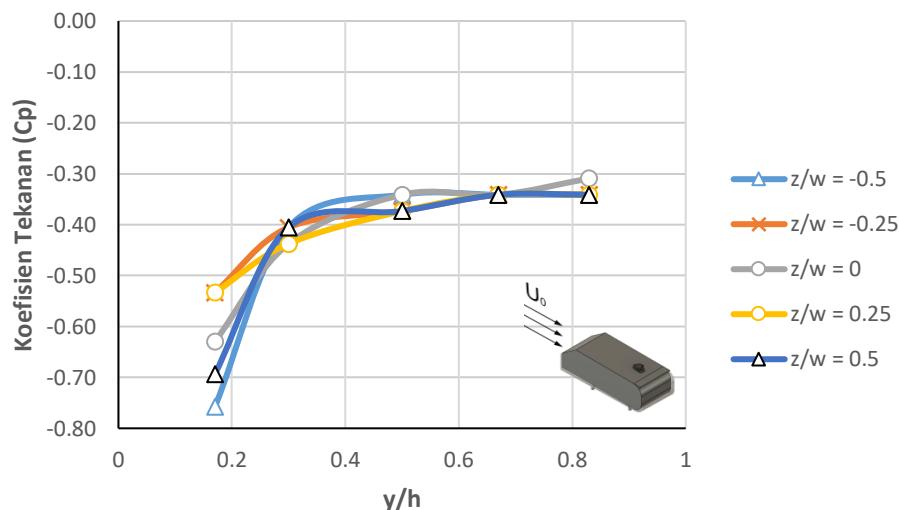
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 11.1 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.330	-0.330	-0.298	-0.330	-0.330
0.67	-0.330	-0.362	-0.330	-0.362	-0.362
0.5	-0.362	-0.362	-0.362	-0.394	-0.362
0.3	-0.394	-0.426	-0.458	-0.426	-0.426
0.17	-0.841	-0.553	-0.713	-0.553	-0.809



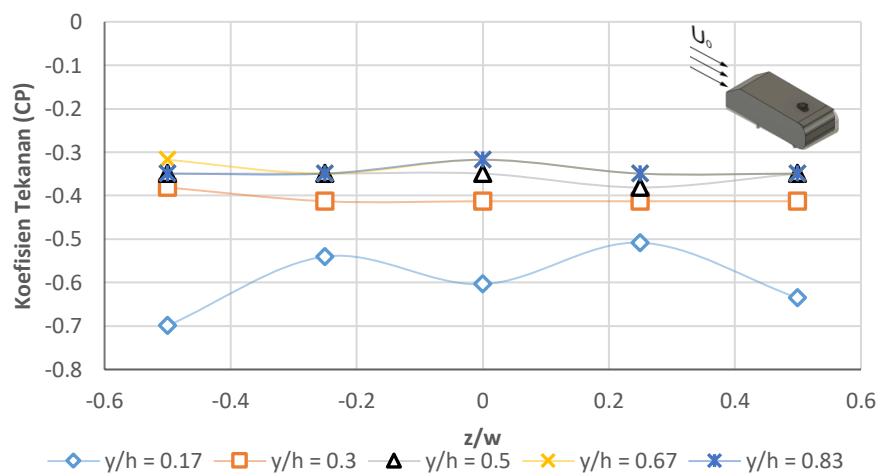
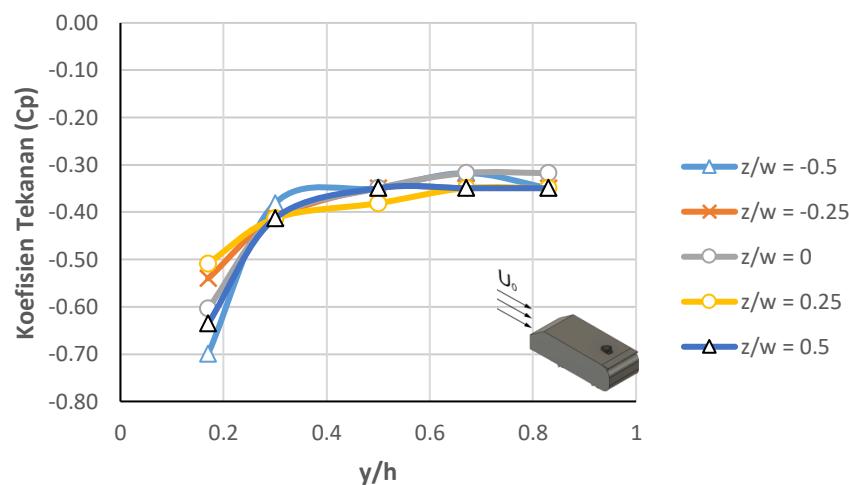
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 13.9 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.341	-0.341	-0.309	-0.341	-0.341
0.67	-0.341	-0.341	-0.341	-0.341	-0.341
0.5	-0.341	-0.373	-0.341	-0.373	-0.373
0.3	-0.405	-0.405	-0.437	-0.437	-0.405
0.17	-0.758	-0.534	-0.630	-0.534	-0.694



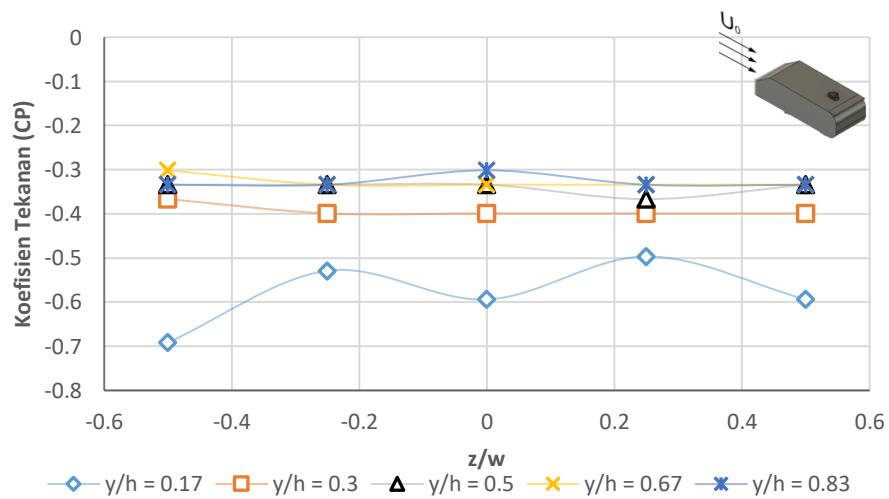
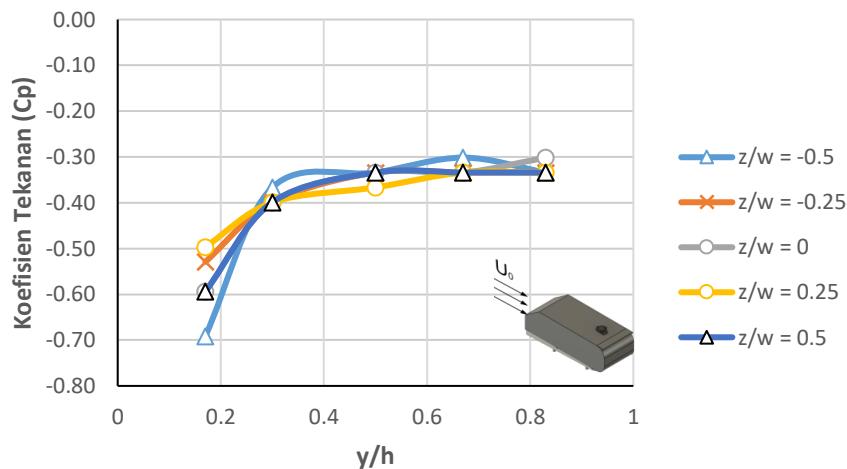
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 16.7 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.349	-0.349	-0.317	-0.349	-0.349
0.67	-0.317	-0.349	-0.317	-0.349	-0.349
0.5	-0.349	-0.349	-0.349	-0.381	-0.349
0.3	-0.381	-0.413	-0.413	-0.413	-0.413
0.17	-0.699	-0.540	-0.604	-0.508	-0.636



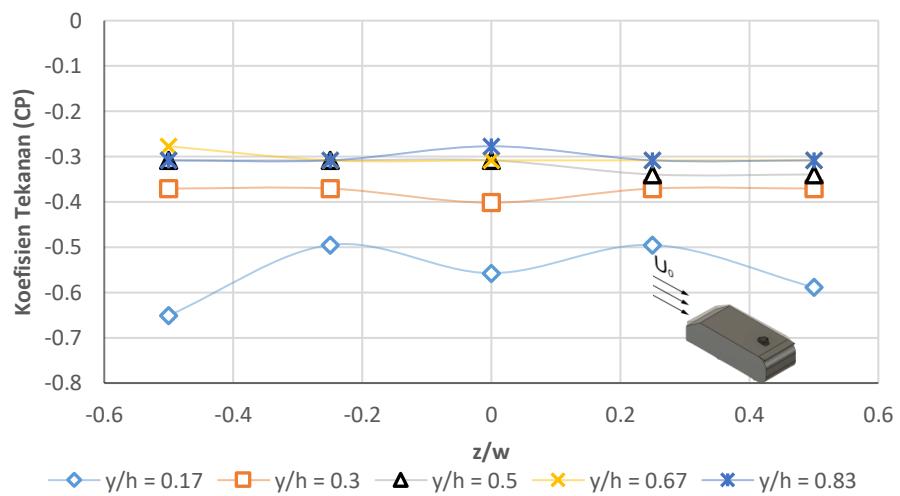
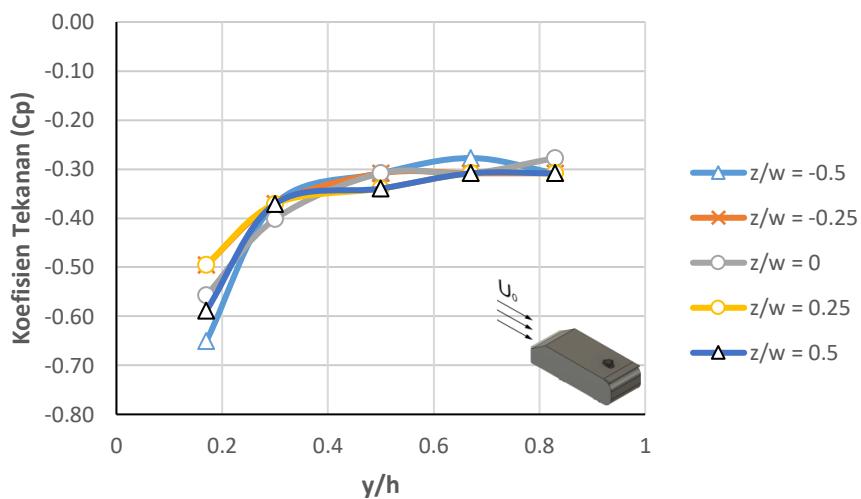
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 19.4 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.334	-0.334	-0.302	-0.334	-0.334
0.67	-0.302	-0.334	-0.334	-0.334	-0.334
0.5	-0.334	-0.334	-0.334	-0.367	-0.334
0.3	-0.367	-0.399	-0.399	-0.399	-0.399
0.17	-0.691	-0.529	-0.594	-0.496	-0.594



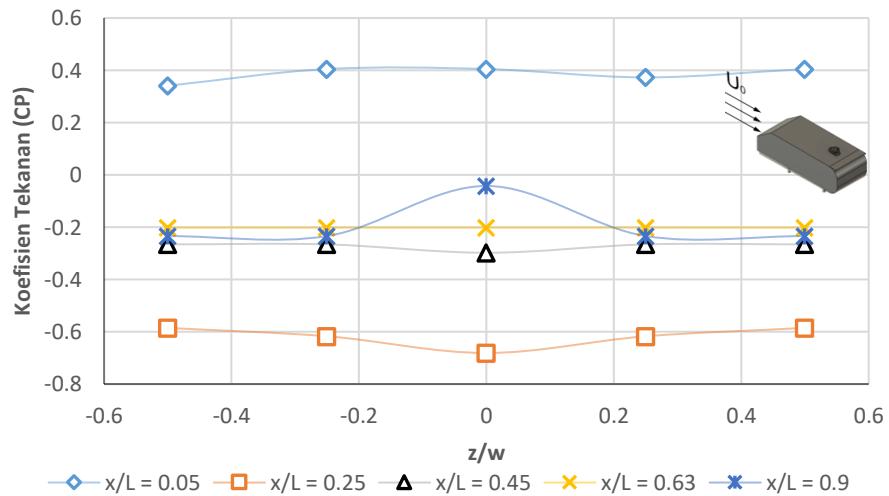
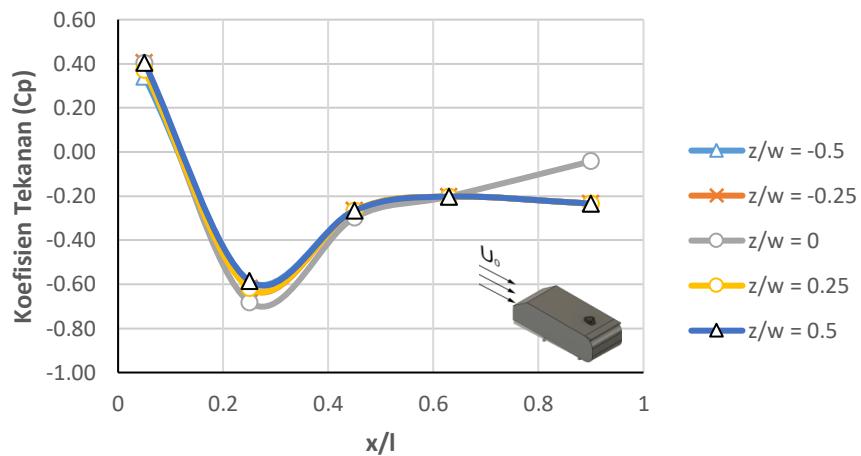
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 22.2 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.308	-0.308	-0.277	-0.308	-0.308
0.67	-0.277	-0.308	-0.308	-0.308	-0.308
0.5	-0.308	-0.308	-0.308	-0.340	-0.340
0.3	-0.371	-0.371	-0.402	-0.371	-0.371
0.17	-0.651	-0.495	-0.557	-0.495	-0.589



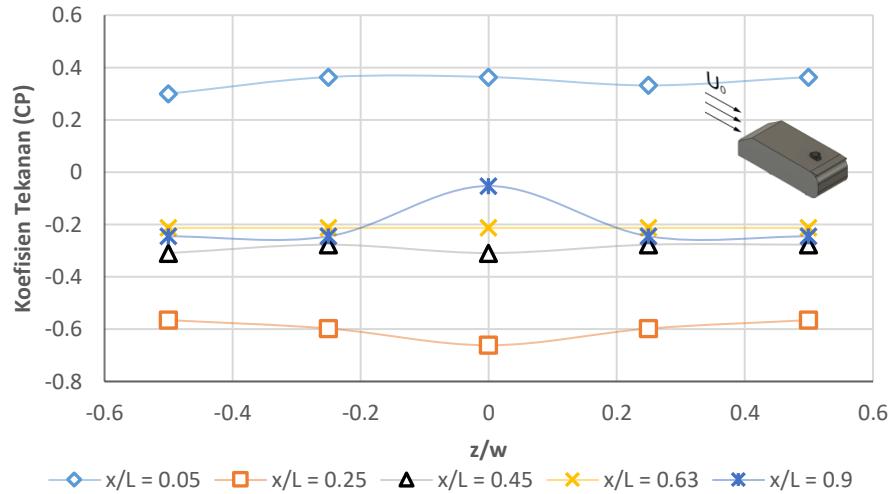
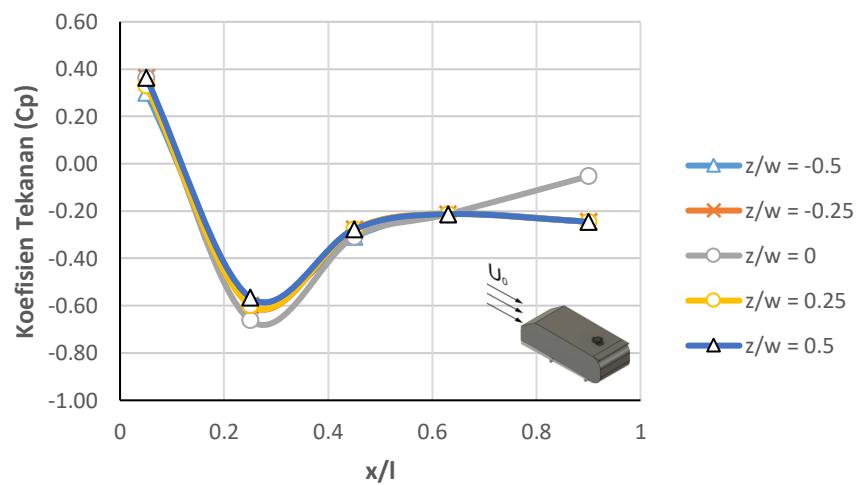
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 11.1 m/s

x/l	Koefisien Tekanan (C_p)				
	z/w				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.234	-0.234	-0.042	-0.234	-0.234
0.63	-0.202	-0.202	-0.202	-0.202	-0.202
0.45	-0.266	-0.266	-0.298	-0.266	-0.266
0.25	-0.585	-0.617	-0.681	-0.617	-0.585
0.05	0.341	0.405	0.405	0.373	0.405



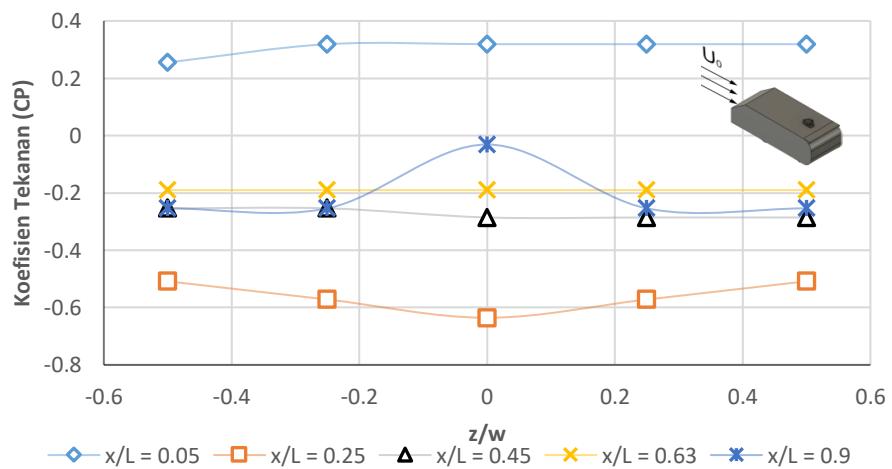
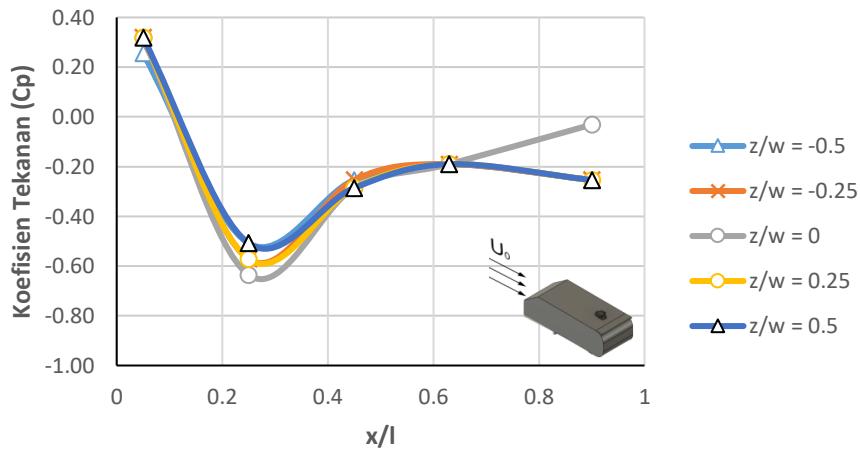
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 13.9 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.245	-0.245	-0.053	-0.245	-0.245
0.63	-0.213	-0.213	-0.213	-0.213	-0.213
0.45	-0.309	-0.277	-0.309	-0.277	-0.277
0.25	-0.566	-0.598	-0.662	-0.598	-0.566
0.05	0.300	0.364	0.364	0.332	0.364



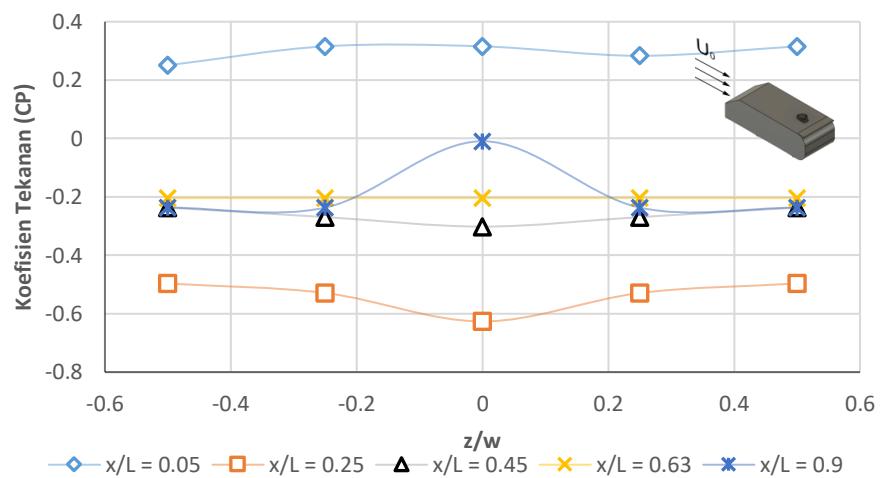
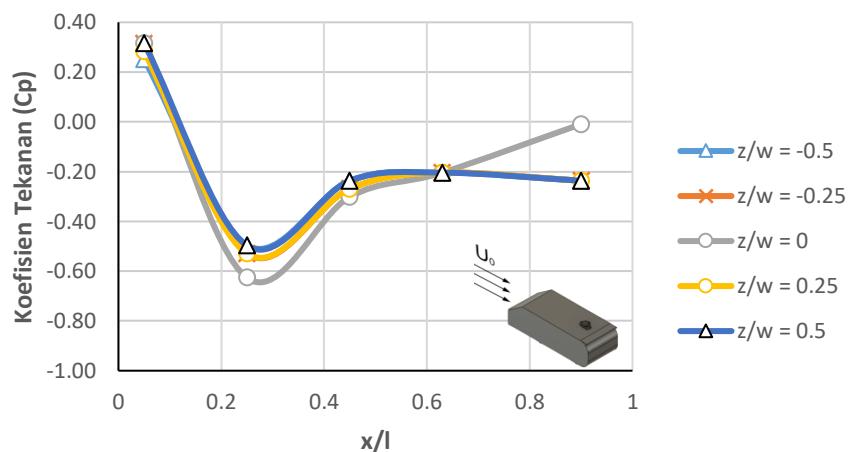
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 16.7 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.254	-0.254	-0.031	-0.254	-0.254
0.63	-0.190	-0.190	-0.190	-0.190	-0.190
0.45	-0.254	-0.254	-0.286	-0.286	-0.286
0.25	-0.508	-0.572	-0.636	-0.572	-0.508
0.05	0.255	0.319	0.319	0.319	0.319



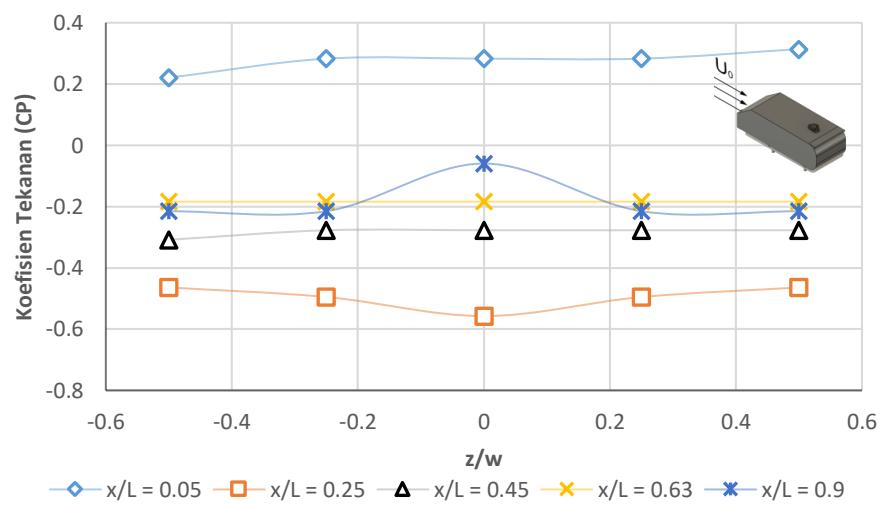
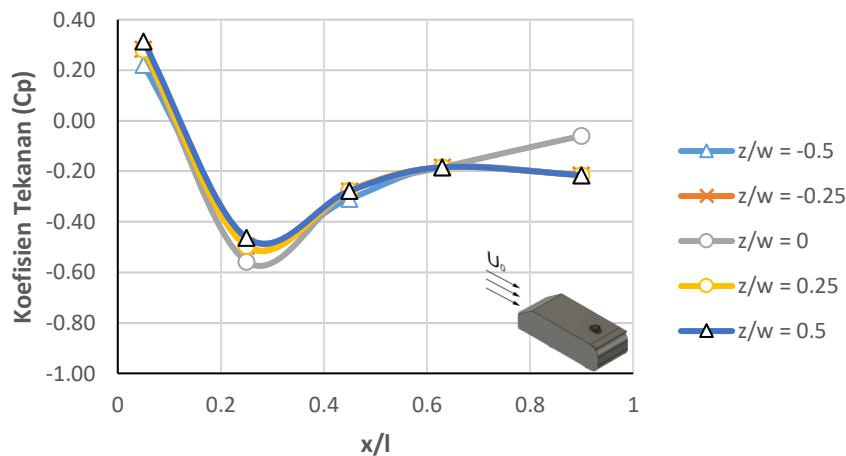
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 19.4 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.237	-0.237	-0.009	-0.237	-0.237
0.63	-0.204	-0.204	-0.204	-0.204	-0.204
0.45	-0.237	-0.269	-0.302	-0.269	-0.237
0.25	-0.496	-0.529	-0.626	-0.529	-0.496
0.05	0.251	0.316	0.316	0.283	0.316



- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 2* dan *spoiler* pada kecepatan *upstream* 22.2 m/s

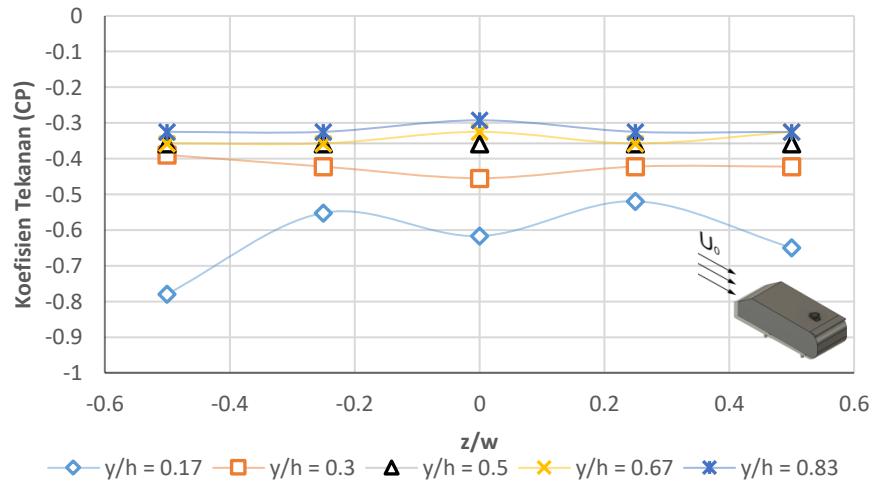
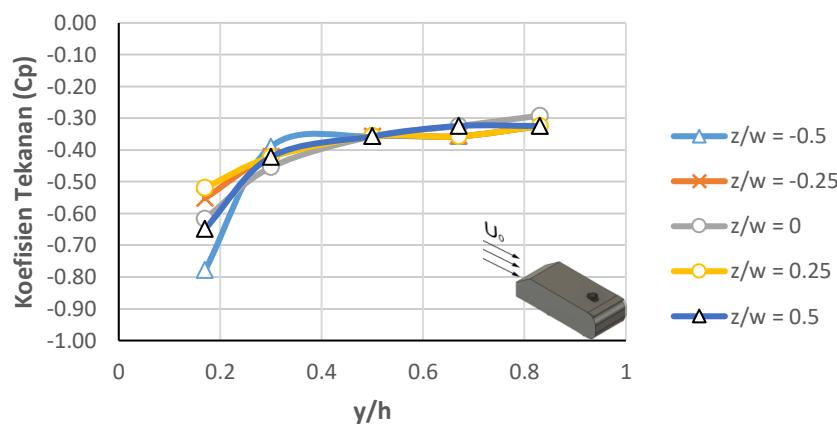
x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.215	-0.215	-0.060	-0.215	-0.215
0.63	-0.184	-0.184	-0.184	-0.184	-0.184
0.45	-0.308	-0.277	-0.277	-0.277	-0.277
0.25	-0.464	-0.495	-0.557	-0.495	-0.464
0.05	0.221	0.283	0.283	0.283	0.314



Lampiran 5 Tabel Dan Grafik Koefisien Tekanan (C_p) Fin 3 dan Spoiler

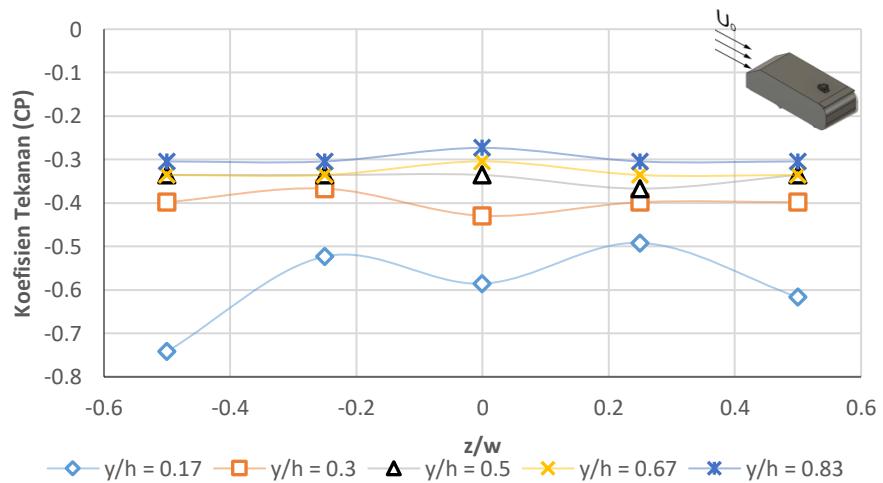
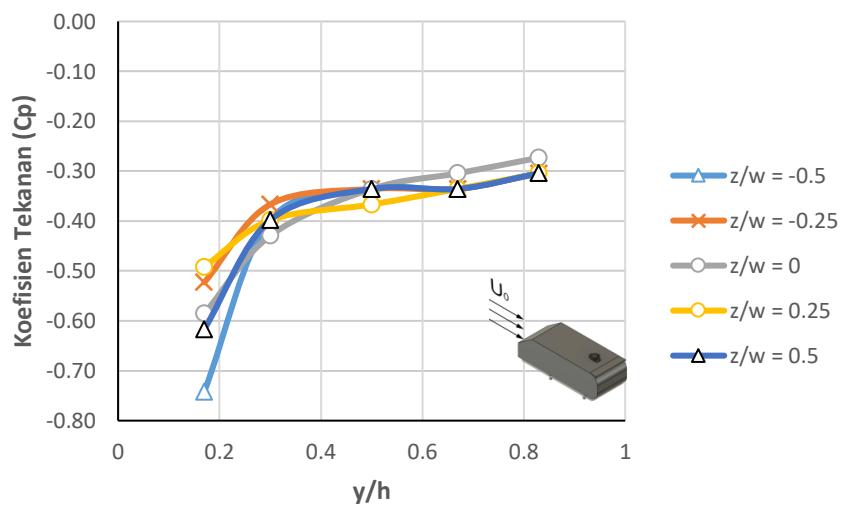
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 3* dan *spoiler* pada kecepatan *upstream* 11.1 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.325	-0.325	-0.292	-0.325	-0.325
0.67	-0.357	-0.357	-0.325	-0.357	-0.325
0.5	-0.357	-0.357	-0.357	-0.357	-0.357
0.3	-0.390	-0.422	-0.455	-0.422	-0.422
0.17	-0.779	-0.552	-0.617	-0.519	-0.649



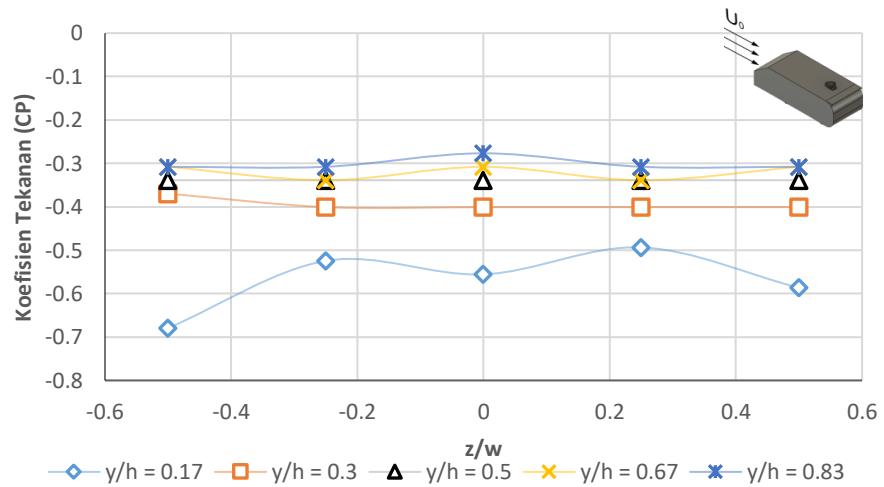
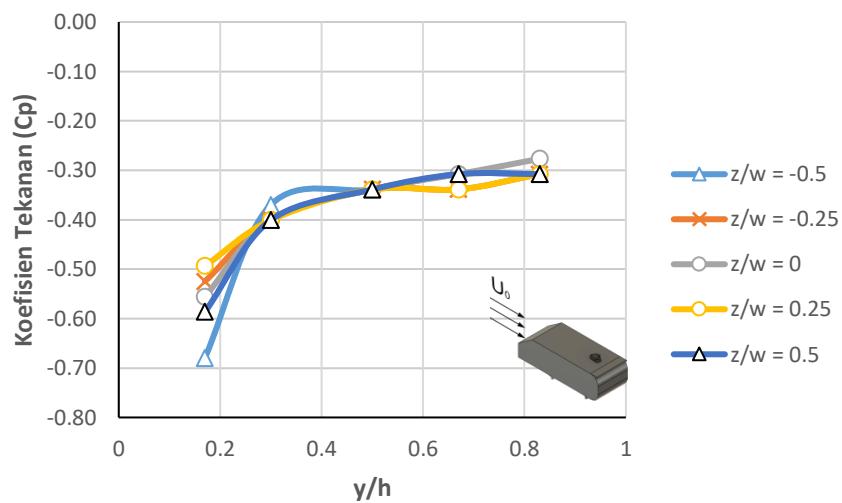
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin* 3 dan *spoiler* pada kecepatan *upstream* 13.9 m/s

y/h	Koefisien Tekanan (C_p)				
	z/w				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.304	-0.304	-0.273	-0.304	-0.304
0.67	-0.336	-0.336	-0.304	-0.336	-0.336
0.5	-0.336	-0.336	-0.336	-0.367	-0.336
0.3	-0.398	-0.367	-0.429	-0.398	-0.398
0.17	-0.742	-0.523	-0.586	-0.492	-0.617



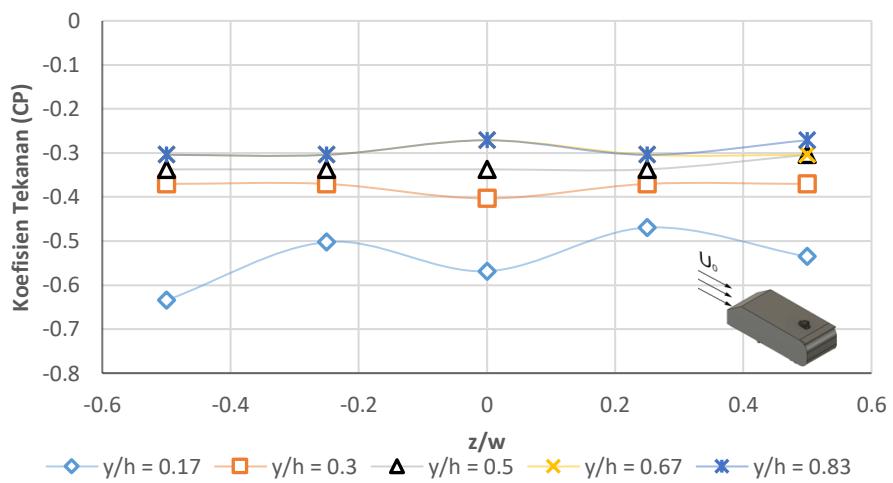
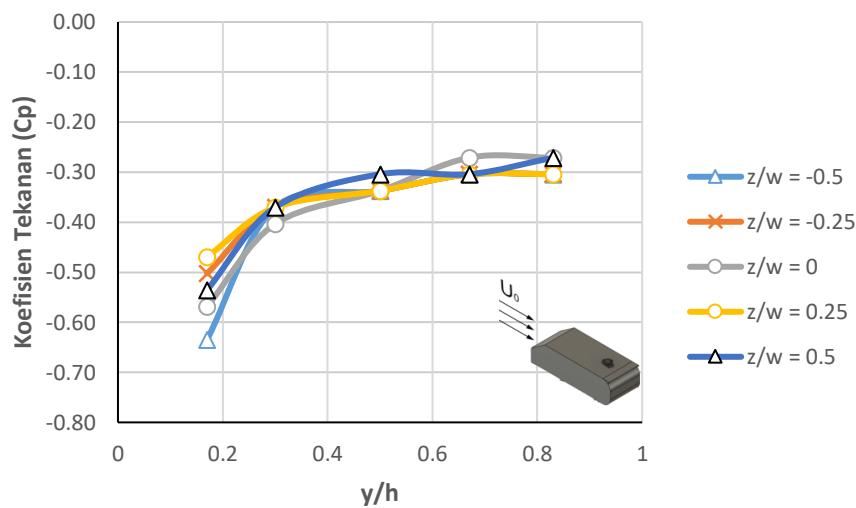
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 3* dan *spoiler* pada kecepatan *upstream* 16.7 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.308	-0.308	-0.277	-0.308	-0.308
0.67	-0.308	-0.339	-0.308	-0.339	-0.308
0.5	-0.339	-0.339	-0.339	-0.339	-0.339
0.3	-0.370	-0.401	-0.401	-0.401	-0.401
0.17	-0.679	-0.525	-0.556	-0.494	-0.587



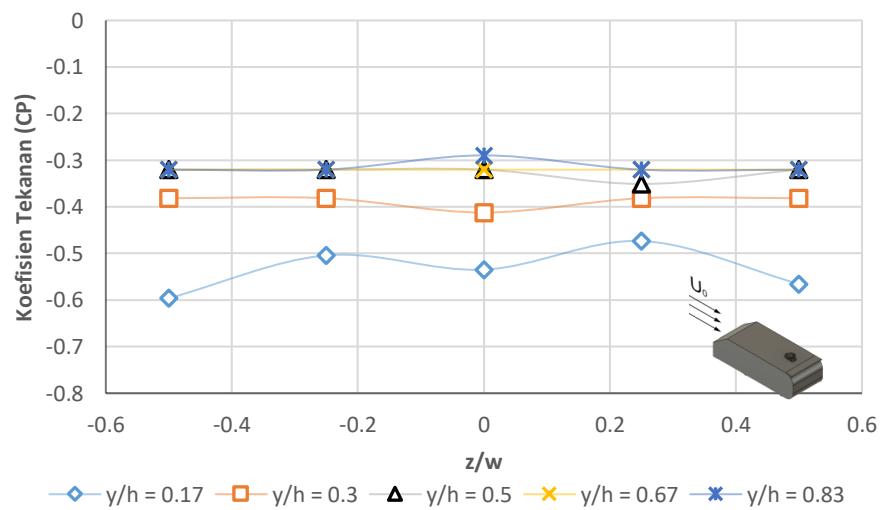
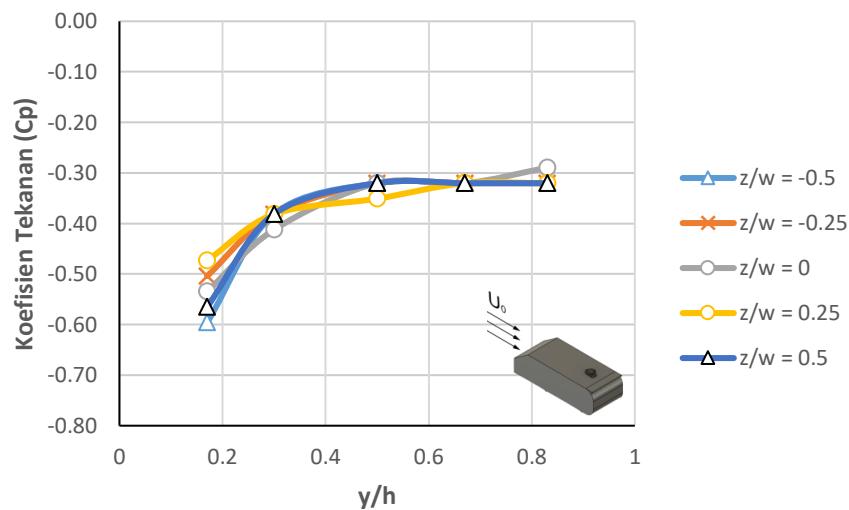
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 3* dan *spoiler* pada kecepatan *upstream* 19.4 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.304	-0.304	-0.271	-0.304	-0.271
0.67	-0.304	-0.304	-0.271	-0.304	-0.304
0.5	-0.337	-0.337	-0.337	-0.337	-0.304
0.3	-0.370	-0.370	-0.403	-0.370	-0.370
0.17	-0.635	-0.502	-0.568	-0.469	-0.535



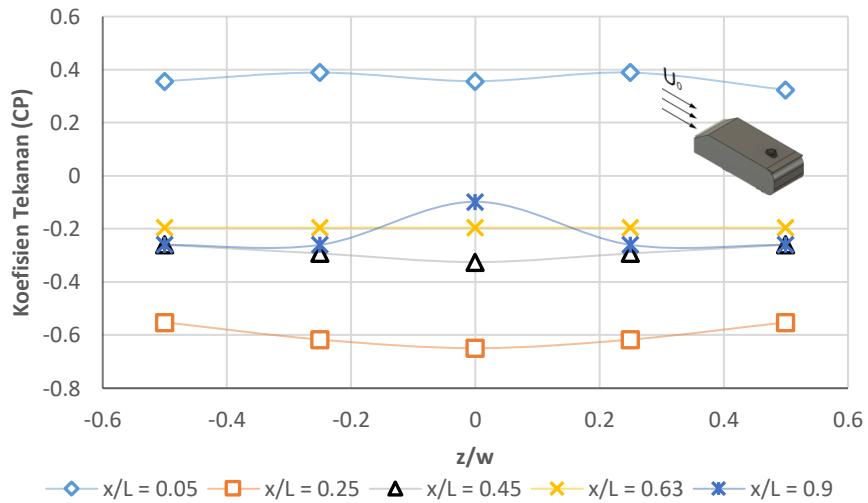
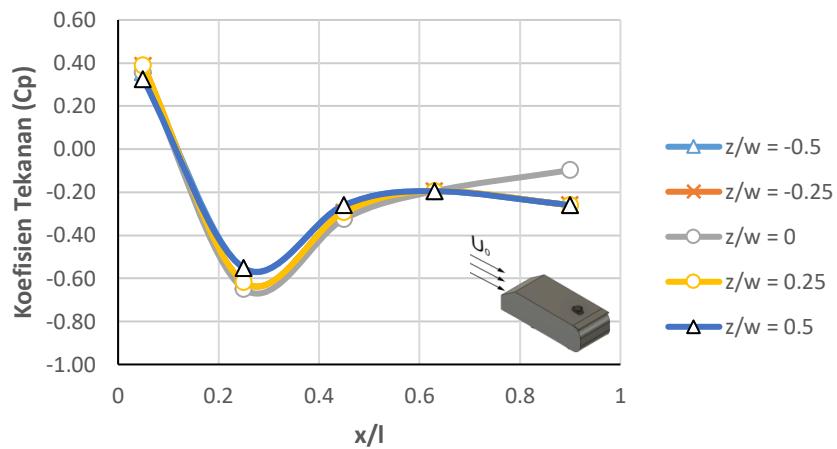
- Koefisien tekanan (C_p) bagian belakang dengan penambahan *fin 3* dan *spoiler* pada kecepatan *upstream* 22.2 m/s

y/h	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.83	-0.320	-0.320	-0.290	-0.320	-0.320
0.67	-0.320	-0.320	-0.320	-0.320	-0.320
0.5	-0.320	-0.320	-0.320	-0.351	-0.320
0.3	-0.382	-0.382	-0.412	-0.382	-0.382
0.17	-0.596	-0.504	-0.535	-0.473	-0.565



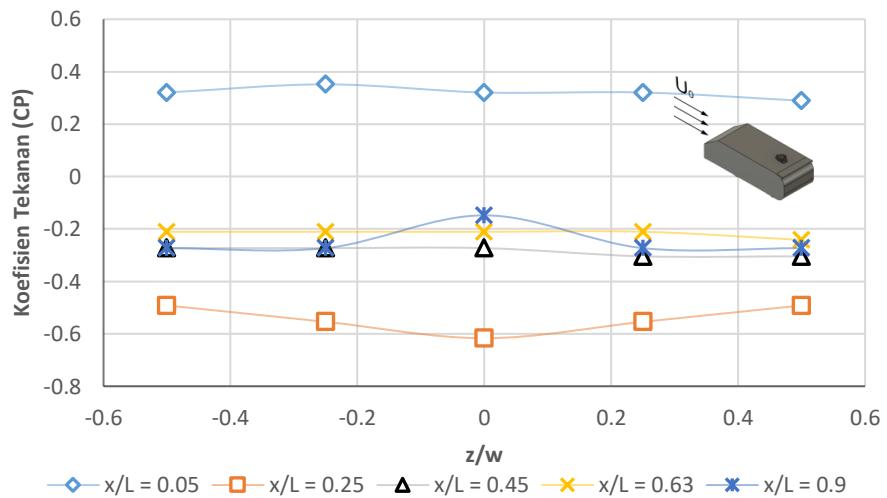
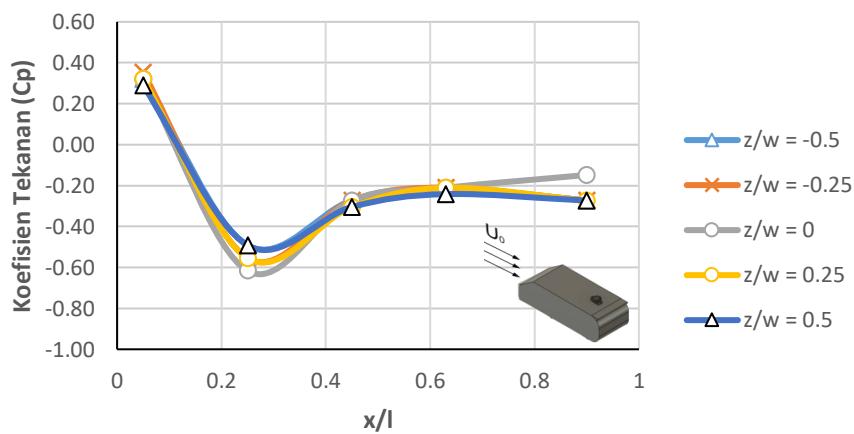
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 3* dan *spoiler* pada kecepatan *upstream* 11.1 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.260	-0.260	-0.098	-0.260	-0.260
0.63	-0.195	-0.195	-0.195	-0.195	-0.195
0.45	-0.260	-0.292	-0.325	-0.292	-0.260
0.25	-0.552	-0.617	-0.649	-0.617	-0.552
0.05	0.357	0.389	0.357	0.389	0.324



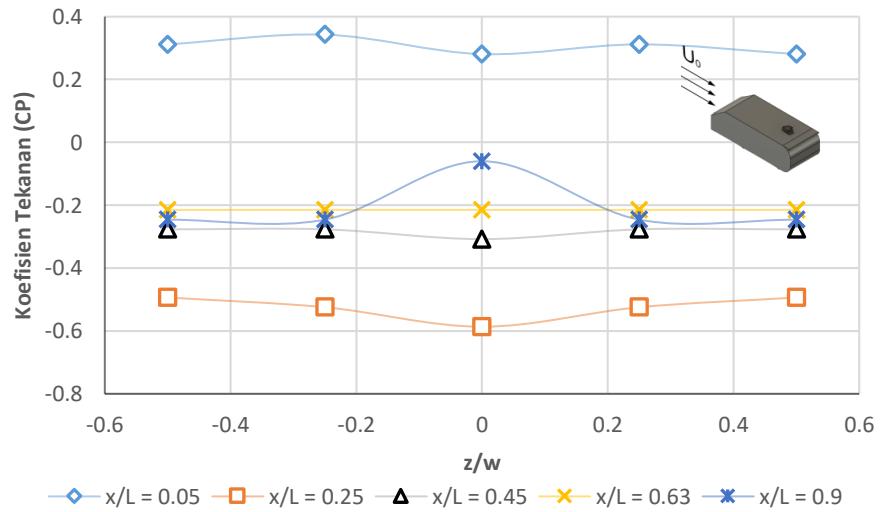
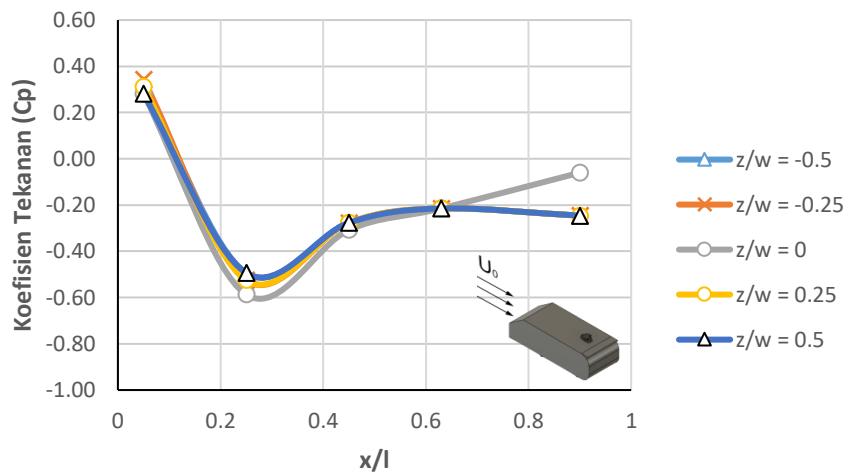
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 3* dan *spoiler* pada kecepatan upstream 13.9 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.273	-0.273	-0.148	-0.273	-0.273
0.63	-0.211	-0.211	-0.211	-0.211	-0.242
0.45	-0.273	-0.273	-0.273	-0.304	-0.304
0.25	-0.492	-0.554	-0.617	-0.554	-0.492
0.05	0.320	0.352	0.320	0.320	0.289



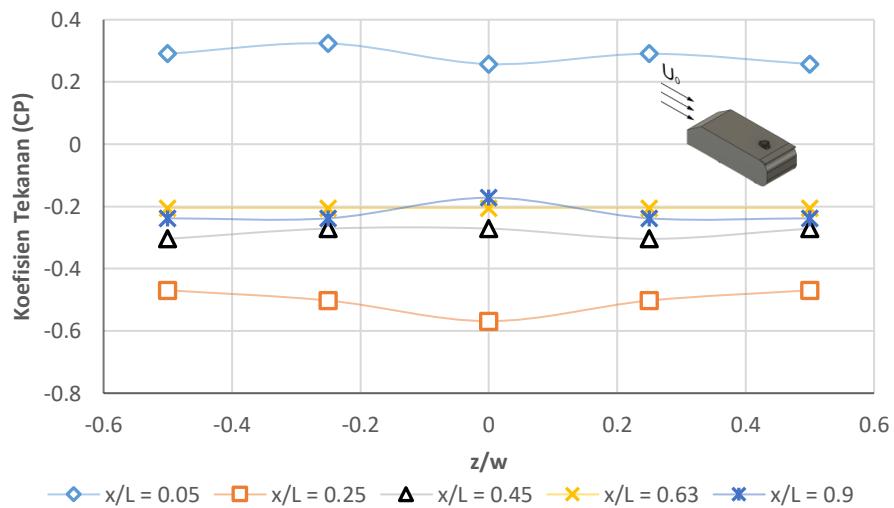
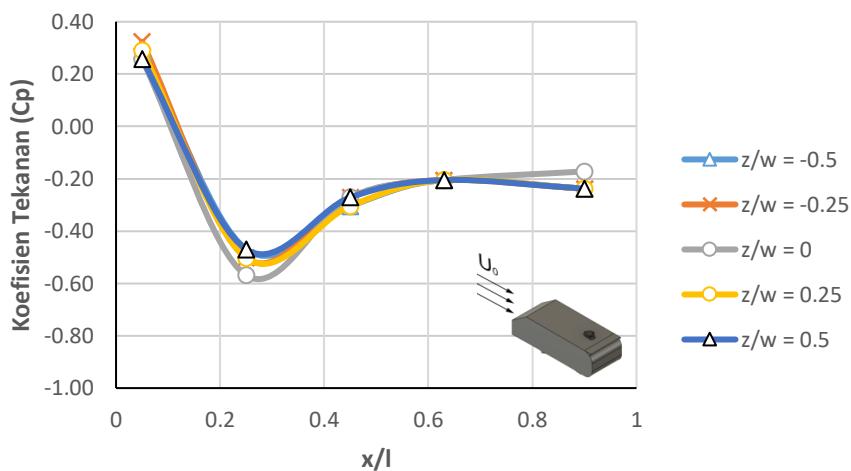
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 3* dan *spoiler* pada kecepatan *upstream* 16.7 m/s

x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.246	-0.246	-0.060	-0.246	-0.246
0.63	-0.215	-0.215	-0.215	-0.215	-0.215
0.45	-0.277	-0.277	-0.308	-0.277	-0.277
0.25	-0.494	-0.525	-0.587	-0.525	-0.494
0.05	0.312	0.343	0.281	0.312	0.281



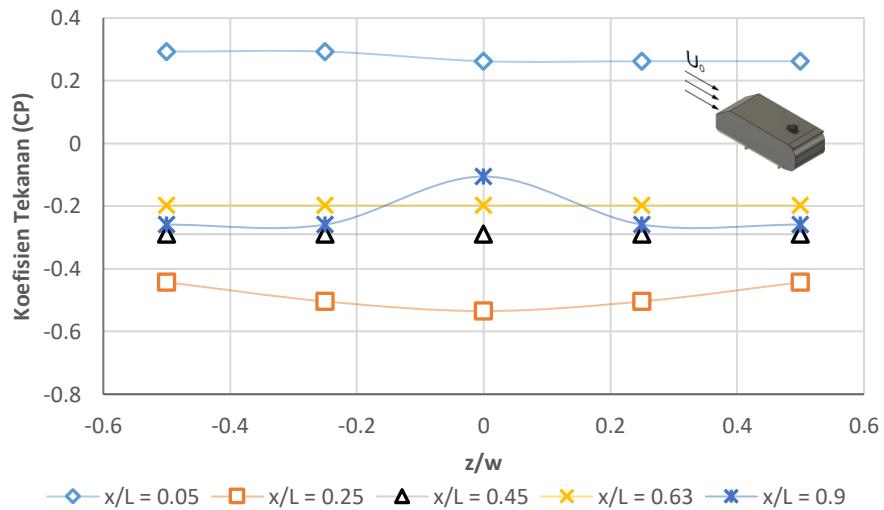
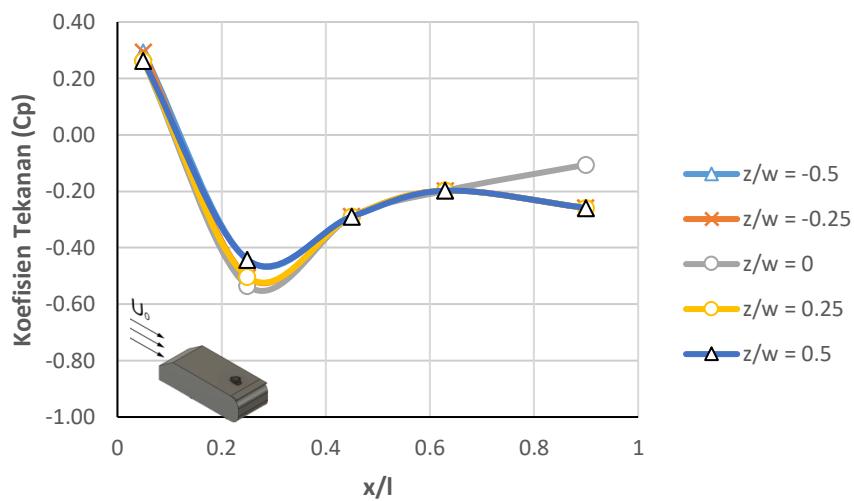
- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 3* dan *spoiler* pada kecepatan *upstream* 19.4 m/s

x/l	Koefisien Tekanan (C_p)				
	z/w				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.238	-0.238	-0.172	-0.238	-0.238
0.63	-0.205	-0.205	-0.205	-0.205	-0.205
0.45	-0.304	-0.271	-0.271	-0.304	-0.271
0.25	-0.469	-0.502	-0.568	-0.502	-0.469
0.05	0.291	0.324	0.258	0.291	0.258



- Koefisien tekanan (C_p) bagian atas dengan penambahan *fin 3* dan *spoiler* pada kecepatan *upstream* 22.2 m/s

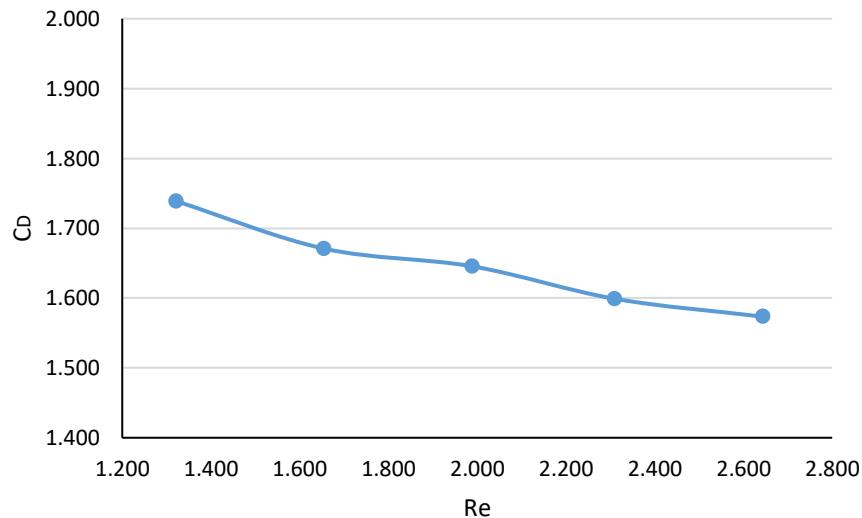
x/l	Koefisien Tekanan (C_p)				
	-0.5	-0.25	0	0.25	0.5
0.9	-0.259	-0.259	-0.106	-0.259	-0.259
0.63	-0.198	-0.198	-0.198	-0.198	-0.198
0.45	-0.290	-0.290	-0.290	-0.290	-0.290
0.25	-0.443	-0.504	-0.535	-0.504	-0.443
0.05	0.293	0.293	0.262	0.262	0.262



Lampiran 6 Tabel dan grafik nilai koefisien drag (C_D) komputasi dan eksperimental

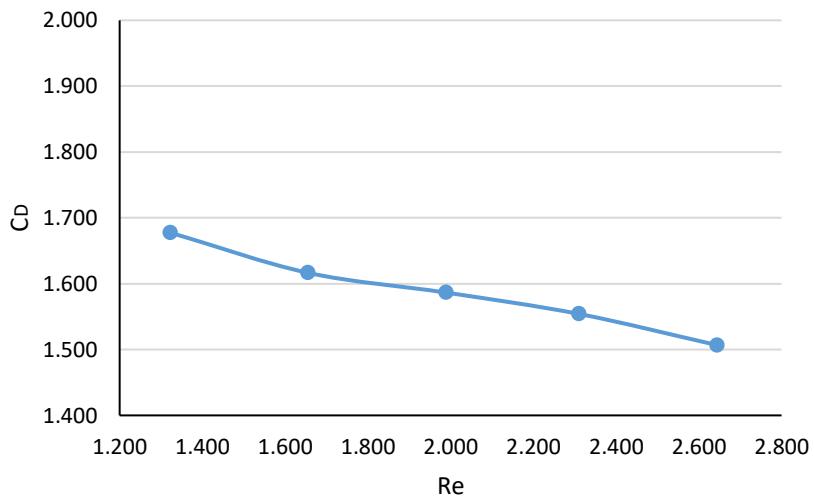
- Koefisien *drag* (C_D) tanpa kontrol aliran komputasi

Reynolds Number (Re)	Nilai Koefisien Drag (C_D)
132221	1.739
165574	1.671
198927	1.645
231089	1.599
264442	1.573



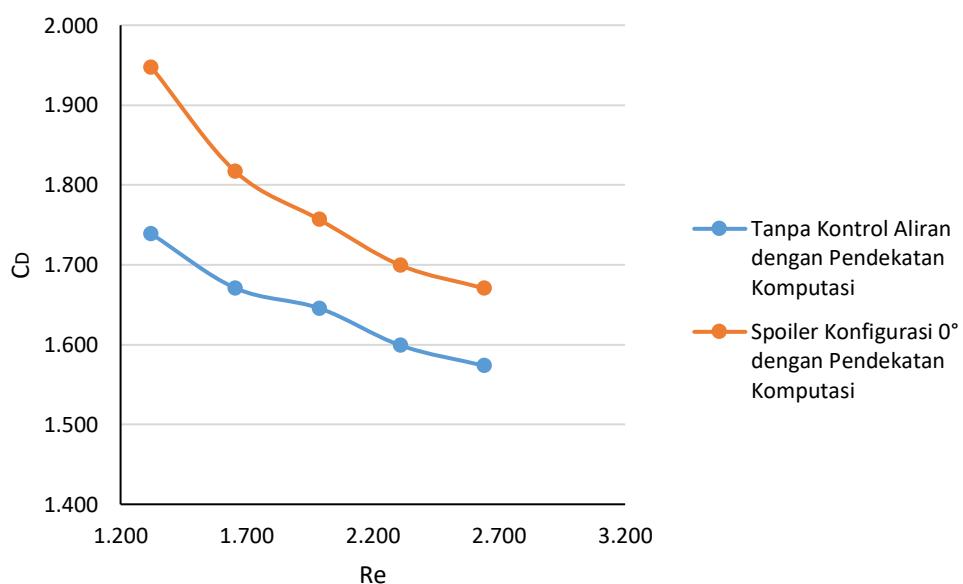
- Koefisien *drag* (C_D) tanpa kontrol aliran eksperimental

Reynolds Number (Re)	Nilai Koefisien Drag (C_D)
132221	1.678
165574	1.616
198927	1.586
231089	1.554
264442	1.507



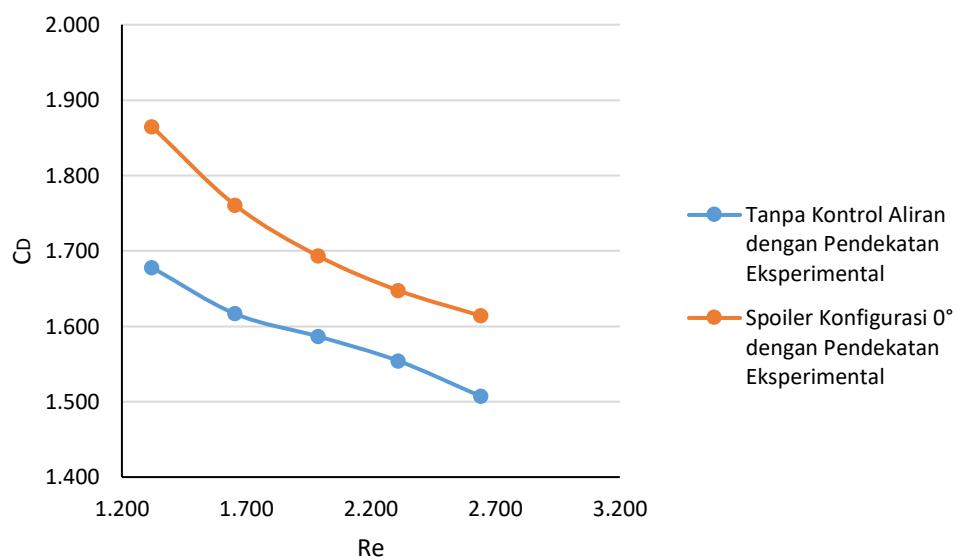
- Koefisien *drag* (C_D) penambahan *spoiler* konfigurasi 0° komputasi

Reynolds Number (Re)	Nilai Koefisien Drag (Cd)		
	Jenis Spoiler		Tanpa kontrol aliran
	Spoiler konfigurasi sudut 0°	Penambahan (%)	
132221	1.947	10.721	1.739
165574	1.817	8.030	1.671
198927	1.756	6.319	1.645
231089	1.699	5.904	1.599
264442	1.670	5.801	1.573



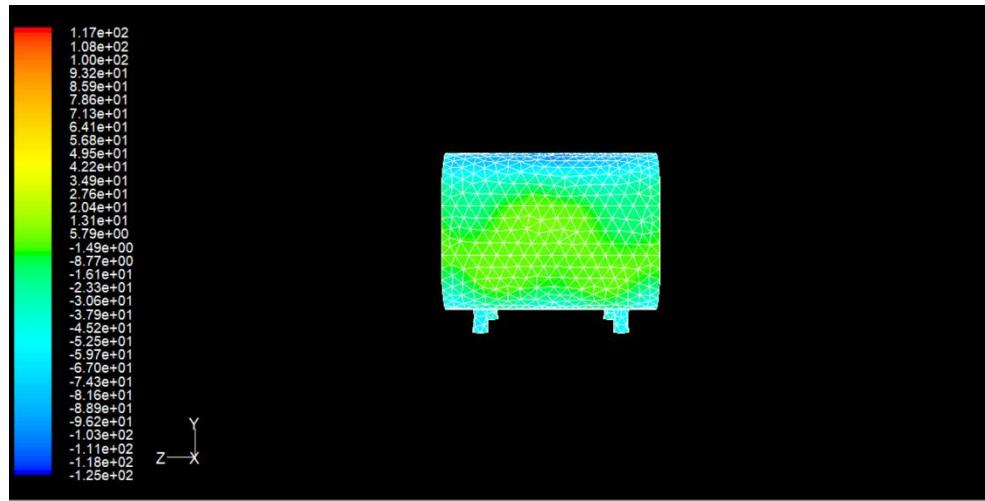
- Koefisien *drag* (C_D) penambahan *spoiler* konfigurasi 0° eksperimental

Reynolds Number (Re)	Nilai Koefisien Drag (C_D)		
	Jenis Spoiler		Tanpa kontrol aliran
	Spoiler konfigurasi sudut 0°	Penambahan (%)	
132221	1.864	10.019	1.678
165574	1.760	8.179	1.616
198927	1.693	6.298	1.586
231089	1.647	5.671	1.554
264442	1.614	6.627	1.507

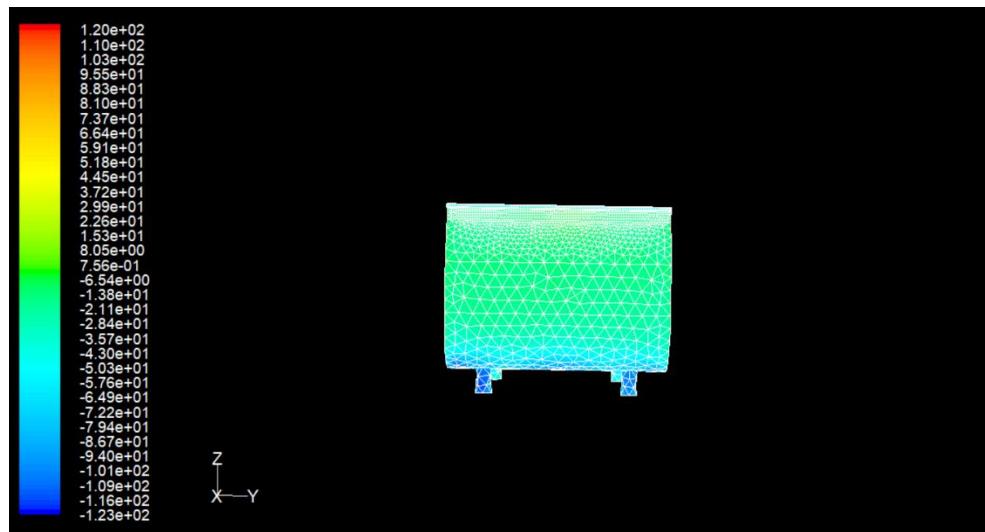


Lampiran 7 Mesh model uji

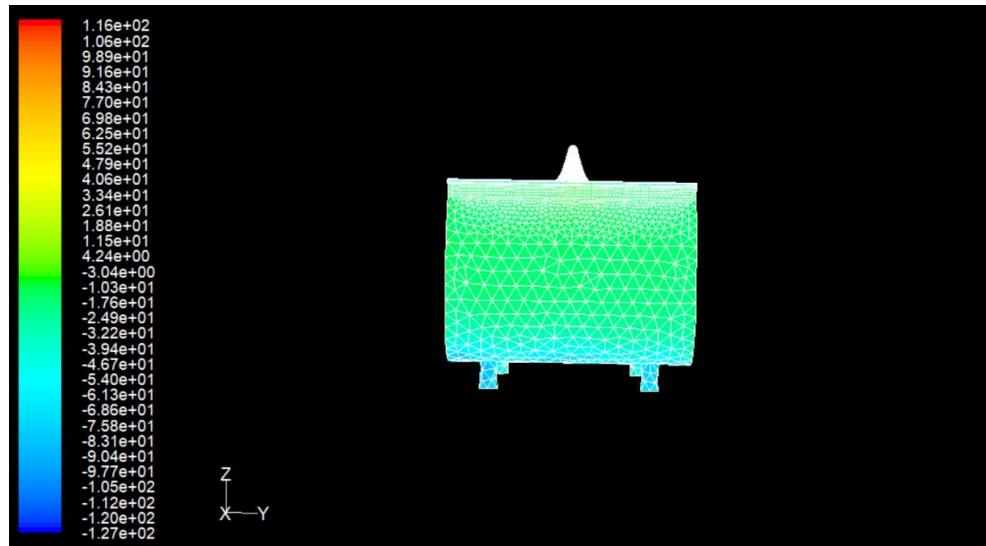
- Mesh bagian belakang tanpa kontrol aliran



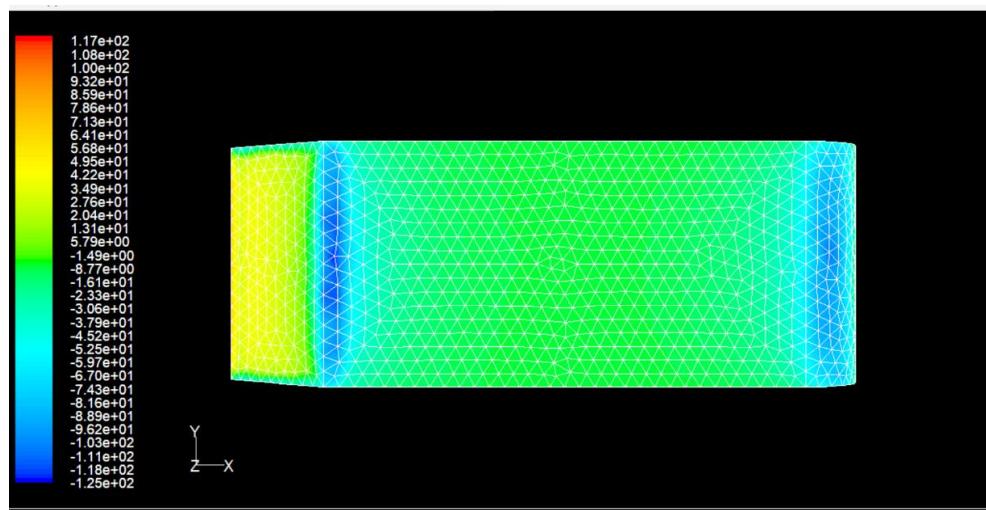
- Mesh bagian belakang penambahan *spoiler* konfigurasi 0°



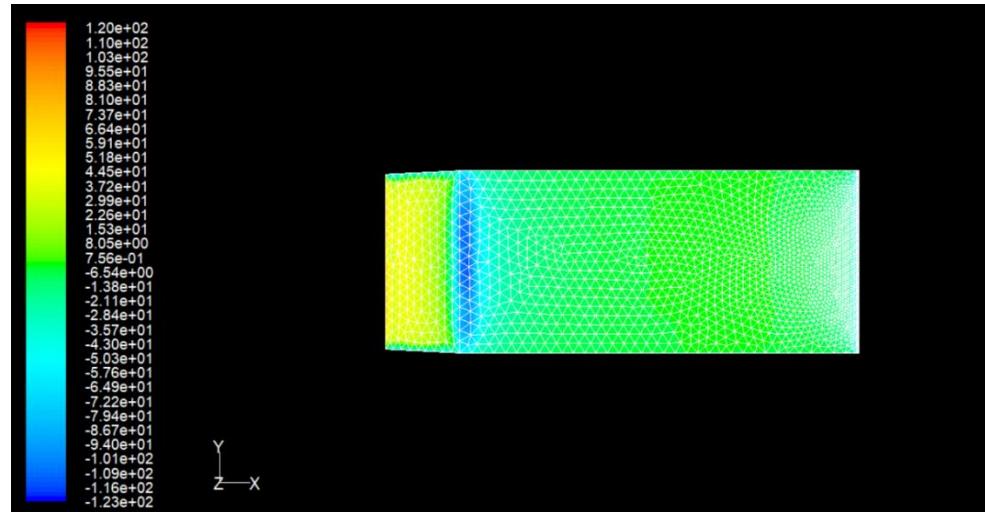
- Mesh bagian belakang penambahan *spoiler* konfigurasi 0° dan *fin*



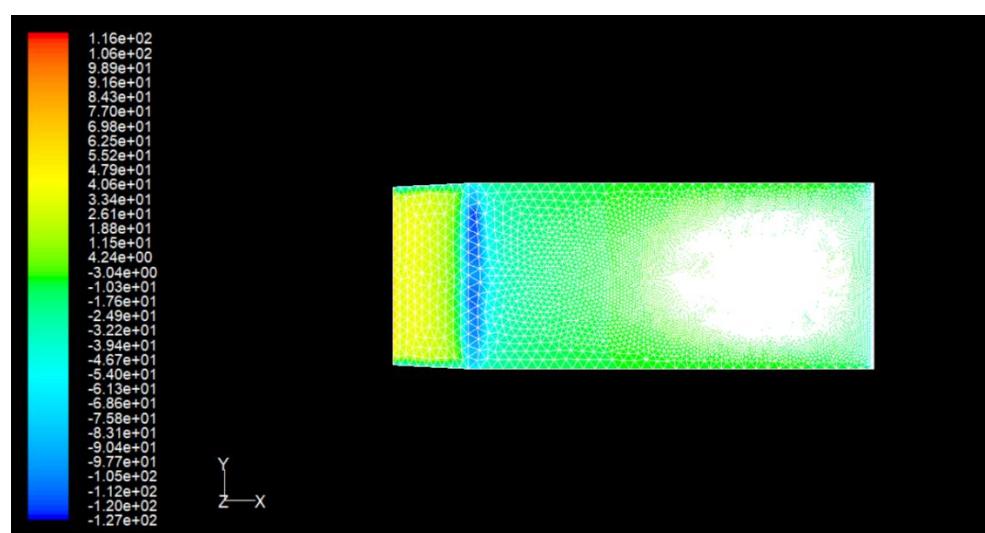
- Mesh bagian atas tanpa kontrol aliran

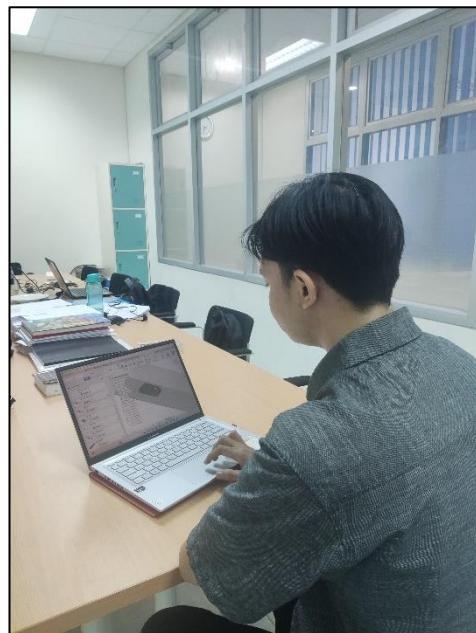


- Mesh bagian atas penambahan *spoiler* konfigurasi 0°



- Mesh bagian atas penambahan *spoiler* konfigurasi 0° dan *fin*



Lampiran 8 Dokomentasi

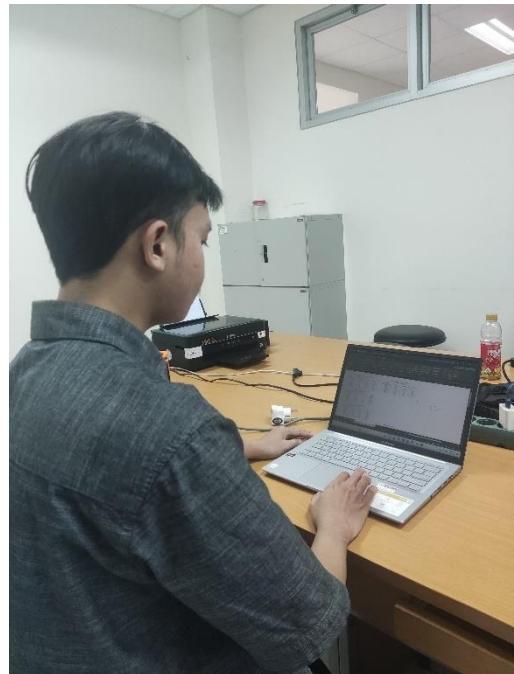
Proses Desain Benda uji dan pengambilan data komputasi



Model Benda Uji Untuk Percobaan Eksperimental



Proses Pengambilan Data Eksperimental



Proses Pengolahan Data Komputasi dan Eksperimental