

BAB III

CONCLUSION

3.1 Building Design Practice

Building design practice that focuses on analyzing a building, with the aim of returning to whether the building meets the applicable safety standards in building construction with reference to SNI.

3.2 Road Design Practice

From the results of the survey that has been carried out, it can be concluded as follows:

1. Vehicle volume

At peak hours towards Rejowinangun as much as 1,950.5 PCU/hour where the results consist of the results of the sum of 3 times, namely morning, afternoon, and evening. Likewise, the volume of vehicles at peak hours towards Jalan Kusumanegara is 1,469.6 PCU/hour as a result of the sum of the survey hours in the morning, afternoon, and evening.

2. Road completeness facilities

From the survey results obtained the existing facilities such as:

- Pavement

On the Jalan Raya Utama, pavement measurements have been carried out where the results of the pavement measurements do not meet the standard requirements in general, namely 1.50 meters, while the results from measurements in the field measure the width of the pavement on the Jalan Raya Utama only 1.28 meters.

- Street lights

After observing the Jalan Raya Utama, it can be concluded that the Jalan Raya Utama has adequate lighting because along a distance of 100 meters there are 3 street lamps.

- Road markings

On the Jalan Raya Utama there are road markings in the form of dotted markings and border lines as road dividers, but some parts of the markings have started to fade.

- Traffic signs

The results of the field survey show that there is only one type of sign on the road, namely parking signs and of course the facility is still incomplete.

3. Environmental conditions

The condition of the road environment in the Jalan Raya Utama related to the presence of vegetation is currently fairly good, where there are many plants that are on the edge of the road in the direction of Kusumanegara. However, it is quite unfortunate because the shoulder of the road is used as a vehicle path when traffic jams occur, and on the Jalan Raya Utama the shoulder of the road is used as a parking lot.

3.3 Water Building Design Practice

On the topic of designing the Bangeran weir it can be concluded that it has a watershed area of 44,1875 km² and has a return period discharge of 25 years 182,9857 m³/second.

3.4 Cost and Time Planning

From this practice of cost and time planning, we can conclude that the construction project of the Widyaiswara Training Building and Supporting Facilities of the South Sumatra Provincial Public Works Office is Rp. 12,224,626,974.95 with a land area of 774 m².

REFERENCE

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Appendix

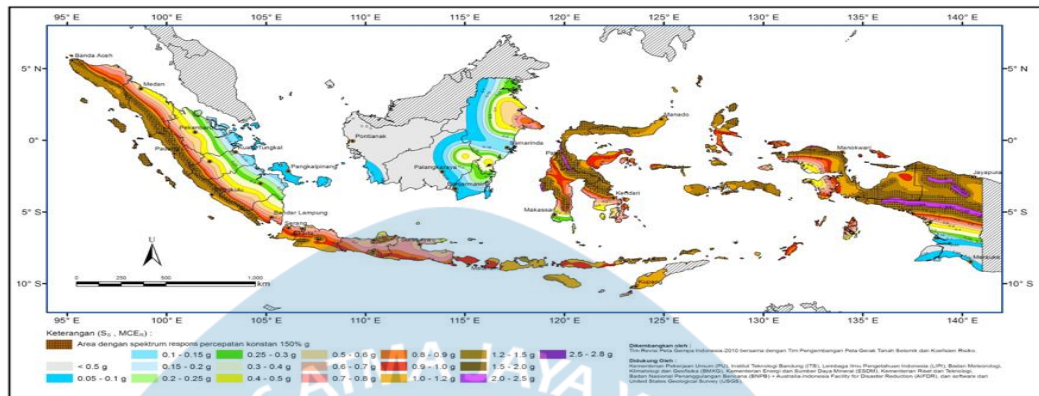


Figure 2.1 S₂, The maximum considered earthquake risk targeted (MCER) in bedrock for a short period(0.2 sec) (Source: SNI 1726:2012)

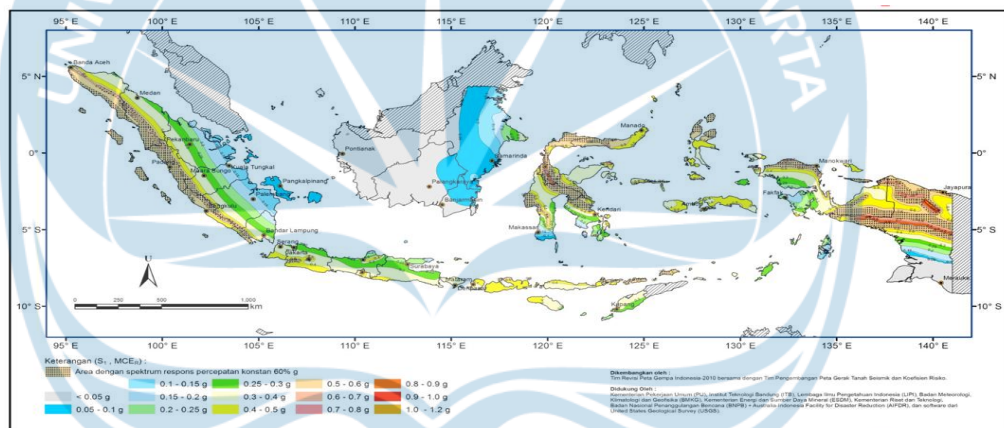


Figure 2.1.1 S₁ The maximum considered earthquake risk (MCER) in rock for a period of 1 second (Source: SNI 1726:2012)



Figure 2.2.1 Pavement on Jalan Raya Utama



Figure 2.2.2 Lighting Conditions on Jalan Raya Utama

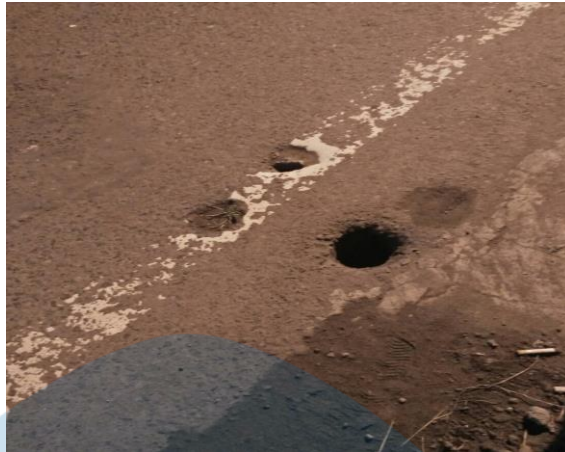


Figure 2.2.3. Drainage Condition on Jalan Raya Utama



Figure 2.2.4. Road Marking Condition on Jalan Raya Utama



Figure 2.2.5. Various Signs on Jalan Raya Utama

Table 2.3.1 Analysis of Annual Average Rainfall

Tahun	Tgl/Bln	Stasiun Kaliurang		Stasiun Kemptu		Stasiun Bronggang		Stasiun Angin-angin		Stasiun Prumpung		Stasiun Santan		Stasiun Beran		Total
		Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	
2000	15-Des	81	3,4344	0	0	0	0	0	0	0	0	0	0	3	0,8484	4,2828
	22-Nov	0	0	200	31,68	0	0	18,3	0,05124	53	23,956	44,5	2,136	25	7,07	64,89324
	27-Apr	0	0	0	0	92	1,3248	1,2	0,00336	12	5,424	4,4	0,2112	1	0,2828	7,24616
	11-Des	0	0	0	0	0	0	47	0,1316	90	40,68	38,7	1,8576	114	32,2392	74,9084
	02-Apr	0	0	0	0	0	0	6,1	0,01708	106	47,912	33,9	1,6272	74	20,9272	70,48348
	20-Mar	29	1,2296	16,5	2,6136	5	0,072	9,5	0,0266	49,5	22,374	82	3,936	32	9,0496	39,3014
	14-Okt	0	0	49	7,7616	0	0	0	0	0	0	8,3	0,3984	105	29,694	37,854
Tahun	Tgl/Bln	Stasiun Kaliurang		Stasiun Kemptu		Stasiun Bronggang		Stasiun Angin-angin		Stasiun Prumpung		Stasiun Santan		Stasiun Beran		Total
2001	06-Feb	90	3,816	36	5,7024	48	0,6912	7	0,0196	34	15,368	19,9	0,9552	9	2,5452	29,0976
	23-Mar	24	1,0176	125	19,8	0	0	0	0	17	7,684	2,5	0,12	8	2,2624	30,884
	05-Okt	0	0	0	0	93	1,3392	0	0	0	0	0	0	0	0	1,3392
	27-Jan	0	0	27	4,2768	5	0,072	90	0,252	26	11,752	22,5	1,08	36	10,1808	27,6136
	02-Des	24	1,0176	7	1,1088	8	0,1152	0	0	164	74,128	9	0,432	0	0	76,8016
	06-Apr	25	1,06	25	3,96	11	0,1584	21	0,0588	25	11,3	101	4,848	14	3,9592	25,3444
	06-Nov	0	0	60	9,504	0	0	0	0	1	0,452	0	0	134	37,8952	47,8512
Tahun	Tgl/Bln	Stasiun Kaliurang		Stasiun Kemptu		Stasiun Bronggang		Stasiun Angin-angin		Stasiun Prumpung		Stasiun Santan		Stasiun Beran		Total
2002	11-Nov	143	6,0632	0	0	0	0	0	0	0	0	0	0	0	0	6,0632
	25-Des	16	0,6784	165	26,136	0	0	0	0	0	0	6	0,288	101	28,5628	55,6652
	05-Okt	25	1,06	0	0	93	1,3392	0	0	0	0	0	0	0	0	2,3992
	19-Mar	0	0	0	0	0	0	19	0,0532	0	0	42	2,016	0	0	2,0692
	06-Feb	14	0,5936	15	2,376	0	0	2	0,0056	121	54,692	74	3,552	95	26,866	88,0852
	23-Jan	0	0	5	0,792	0	0	2,5	0,007	25	11,3	80	3,84	1	0,2828	16,2218
	16-Nov	29	1,2296	0	0	0	0	0	0	0	0	0	0	96	27,1488	28,3784

Tahun	Tgl/Bln	Stasiun Kaliurang		Stasiun Kemptu		Stasiun Bronggang		Stasiun Angin-angin		Stasiun Prumpung		Stasiun Santan		Stasiun Beran		Total
		Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	
2003	12-Apr	101	4,2824	0	0	3	0,0432	0	0	0	0	0	0	0	0	4,3256
	04-Mei	0	0	92	14,5728	0	0	0	0	9	4,058	0	0	4	1,1312	19,772
	27-Jan	5	0,212	0	0	140	2,016	0	0	0	0	27	1,296	0	0	3,524
	13-Jan	67	2,8408	4	0,6336	0	0	45	0,126	1	0,452	0	0	1	0,2828	4,3352
	21-Mar	0	0	17	2,6928	79	1,1376	0	0	76	34,352	0	0	51	14,4228	52,6052
	27-Feb	0	0	69	10,9296	69	0,9936	1,5	0,0042	7	3,164	196	9,408	22	6,2216	30,721
	26-Feb	43	1,8232	10	1,584	2	0,0288	1,5	0,0042	5	2,26	0	0	93	26,3004	32,0006
Tahun	Tgl/Bln	Stasiun Kaliurang		Stasiun Kemptu		Stasiun Bronggang		Stasiun Angin-angin		Stasiun Prumpung		Stasiun Santan		Stasiun Beran		Total
2004	04-Dec	128	5,4272	0	0	28,5	0,4104	1	0,0028	0	0	0	0	2	0,5656	6,406
	17-Jan	6	0,2544	125	19,8	7,8	0,11232	0	0	1	0,452	13	0,624	25	7,07	28,31272
	29-Feb	0	0	4	0,6336	419	6,0336	156	0,4368	3	1,356	184	8,832	1	0,2828	17,5748
	29-Nov	0	0	0	0	23,5	0,3384	88	0,2464	90	40,68	13	0,624	43	12,1604	54,0492
	29-Jan	0	0	90	14,256	5	0,072	80	0,224	83	37,516	0	0	101	28,5628	80,6308
	30-Jan	0	0	95	15,048	57	0,8208	9	0,0252	1	0,452	110	5,28	0	0	21,626
	27-Dec	7	0,2968	50	7,92	86,5	1,2456	25	0,07	2	0,904	86	4,128	169	47,7932	62,3576
Tahun	Tgl/Bln	Stasiun Kaliurang		Stasiun Kemptu		Stasiun Bronggang		Stasiun Angin-angin		Stasiun Prumpung		Stasiun Santan		Stasiun Beran		Total
2005	19-Jan	115	487,6	15	237,6	2	2,88	15	4,2	1	45,12	0	0	1	28,28	8,0568
	23-Feb	3	12,72	161	2550,24	162	233,28	145	40,6	29	1308,48	72	345,6	62	1753,36	62,4428
	14-Feb	0	0	55	871,2	79,3	114,492	45	12,6	9	406,08	45	216	22	622,16	22,42232
	17-Dec	0	0	35	554,4	40,5	58,32	105	29,4	107	4827,84	0	0	98	2771,44	82,414
	07-Apr	0	0	39	617,76	66,3	95,472	36,5	10,22	69	3113,28	29	139,2	30	848,4	48,24332
	21-Jan	4	16,96	40	633,6	42,1	60,624	20	5,6	44	1985,28	145	696	51	1442,28	48,40344
	10-Dec	0	0	83	1314,72	0	0	8,5	2,38	36	1624,32	0	0	144	4072,32	70,1374

Tahun	Tgl/Bln	Stasiun Kaliurang		Stasiun Kempt		Stasiun Bronggang		Stasiun Angin-angin		Stasiun Prumpung		Stasiun Santan		Stasiun Beran		Total
		Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	
2006	07-Nov	392	1492,48	0	0	0	0	25	7	15	676,8	0	0	0	0	21,7628
	10-Apr	0	0	155	2455,2	143	205,92	0	0	181	8166,72	81,5	391,2	57	1611,96	128,31
	13-Mar	0	0	2	31,68	64	92,16	11	3,08	12	541,44	22	105,6	22	622,16	13,9612
	23-Feb	62	262,88	0	0	4,5	6,48	145	40,6	0	0	14	67,2	14	395,92	7,7308
	28-Feb	40	169,6	0	0	48,5	69,84	0	0	78	3519,36	59	283,2	59	1668,52	57,1052
	13-Dec	7	29,68	11	174,24	2,1	3,024	40	11,2	40	1804,8	84	403,2	0	0	24,26144
	10-Dec	14	59,36	10	158,4	8,8	12,672	6	1,68	8,5	383,52	0	0	144	4072,32	46,87952
2007	03-Jan	73	309,52	0	0	0	0	0	0	0	0	0	0	0	0	3,0952
	21-Jan	0	0	25	396	19	27,36	0	0	0	0	0	0	0	0	4,2336
	29-Okt	0	0	10	158,4	201	289,44	0	0	44	1985,28	15	72	69	1951,32	44,5644
	17-Apr	40,1	170,024	7	110,88	19	27,36	42	11,76	62	2797,44	14	67,2	67	1894,76	50,79424
	26-Dec	0	0	5	79,2	55	79,2	60	16,8	81	3654,72	47	225,6	2	56,56	41,1208
	28-Dec	0	0	2	31,68	31	44,64	3	0,84	13	586,56	157	753,6	25	707	21,2432
	13-Nov	0	0	3	47,52	2,3	3,312	30	8,4	50	2256	0	0	92	2601,76	49,16992
2008	21-Jan	152	644,48	0	0	0	0	7	1,96	6	270,72	0	0	0	0	9,1716
	11-Mar	0	0	188	2977,92	31	44,64	19	5,32	17	767,04	12	57,6	40	1131,2	49,8372
	01-Feb	21,5	91,16	20	316,8	111	159,84	0	0	0	0	12,5	60	10	282,8	9,106
	17-Apr	19	80,56	6	95,04	11,5	16,56	42	11,76	62	2797,44	15	72	12	339,36	34,1272
	26-Dec	0	0	0	0	7	10,08	60	16,8	61	3654,72	0	0	0	0	36,816
	13-Apr	0	0	15	237,6	73	105,12	12,7	3,556	5	225,6	68	326,4	0	0	8,98276
	01-Nov	0	0	0	0	28	40,32	11	3,08	42	1895,04	40	192	129	3648,12	57,7856

Tahun	Tgl/Bln	Stasiun Kaliurang		Stasiun Kempt		Stasiun Bronggang		Stasiun Angin-angin		Stasiun Prumpung		Stasiun Santan		Stasiun Beran		Total
		Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	Bobot %	Jmlh	
2009	04-Dec	215	911,6	0	0	2	2,88	21,2	5,936	15	676,8	0	0	4	113,12	17,10336
	11-Mar	0	0	188	2977,92	0	0	19	5,32	17	767,04	2	9,6	0	0	37,5988
	30-Jan	32	135,68	43	681,12	86,5	124,56	0	0	0	0	12	57,6	63,5	1795,78	27,9474
	17-Apr	0	0	6	95,04	9	12,96	42	11,76	62	2797,44	3	14,4	0	0	29,316
	26-Dec	0	0	0	0	55	79,2	60	16,8	81	3654,72	0	0	12,1	342,188	40,92908
	03-Feb	18	76,32	0	0	42	60,48	20	5,6	30	1353,6	98	470,4	23	650,44	26,1684
	28-Jan	74	313,76	1	15,84	65,5	94,32	0	0	0	0	0	0	112	3167,36	35,9128



Table 2.3.2 Price of Dispersion Calculation

n	year	Xi	(Xi-Xr)	(Xi-Xr) ²	(Xi-Xr) ³	(Xi-Xr) ⁴
1	2000	74,9084	3,6045	12,9923	46,8307	168,8007
2	2001	76,8016	5,4977	30,2246	166,1653	913,5248
3	2002	88,0852	16,7813	281,6116	4725,8058	79305,1084
4	2003	52,6052	-18,6987	349,6418	-6537,8519	122249,4096
5	2004	80,6308	9,3269	86,9908	811,3538	7567,4062
6	2005	70,1374	-1,1665	1,3608	-1,5873	1,8516
7	2006	128,3100	57,0061	3249,6941	185252,3461	10560511,5425
8	2007	50,7942	-20,5097	420,6466	-8627,3247	176943,6004
9	2008	49,8372	-21,4667	460,8197	-9892,2843	212354,8181
10	2009	40,9291	-30,3748	922,6304	-28024,7440	851246,8901
Total		713,0391		5816,6128	137918,7095	12011262,9526
Xr		71,3039				
n		10,0000				

Table 2.4.1 Estimation cost data biaya Gedung Diklat Widyaaiswara

1ST FLOOR

URAIAN PEKERJAAN	VOL	SAT	HARGA SATUAN	JUMLAH HARGA	TOTAL
PEKERJAAN PERSIAPAN					
Pembersihan Lapangan	774.00	m2	Rp 13,475.00	Rp 10,429,650.00	
Uitzet dan Bouwplank	123.00	m'	Rp 279,097.50	Rp 34,328,992.50	
				Total	Rp 44,758,642.50
PEKERJAAN GALIAN DAN URUGAN					
Galian tanah	214.84	m3	Rp 64,487.50	Rp 13,854,558.99	
Urugan kembali	76.26	m3	Rp 46,475.00	Rp 3,544,229.98	
				Total	Rp 17,398,788.96
PEKERJAAN PASANGAN DAN PLESTERAN					
Pasangan Bata	671.13	m2	Rp 109,495.38	Rp 58,765,029.01	
Plesteran	1342.26	m2	Rp 56,355.42	Rp 60,490,735.64	
Acian	1342.26	m2	Rp 33,671.00	Rp 42,277,835.56	
				Total	Rp 161,533,600.21
PEKERJAAN STRUKTUR BETON					
Pekerjaan Tiang Pancang					
Pek. Pемancangan	864.00	m'	Rp 150,000.00	Rp 129,600,000.00	
Pekerjaan Beton Struktur					
Pilecap PC 1					
Beton K-400	24.30	m3	Rp 1,233,770.67	Rp 29,980,627.28	
Bekisting	151.20	m2	Rp 163,097.00	Rp 24,660,266.40	
Pembesian dengan besi polos dan ulir Sloof S1 20 x 30	675.22	kg	Rp 15,040.30	Rp 10,155,451.20	
Beton K-300	17.16	m3	Rp 1,075,033.31	Rp 18,447,571.60	
Bekisting	231.04	m2	Rp 173,272.00	Rp 40,032,762.88	
Pembesian dengan besi polos dan ulir Kolom K1 40x40	2219.86	kg	Rp 15,040.30	Rp 33,387,367.88	
Beton K-300	23.10	m3	Rp 1,075,033.31	Rp 24,837,569.60	
Bekisting	231.04	m2	Rp 288,788.50	Rp 66,721,695.04	
Pembesian dengan besi polos dan ulir Plat bordes tebal 15 cm	2591.16	kg	Rp 15,040.30	Rp 38,971,823.75	
Beton K-300	0.54	m3	Rp 1,075,033.31	Rp 580,517.99	
Bekisting	0.97	m2	Rp 332,788.50	Rp 322,804.85	
Pembesian dengan besi polos dan ulir Plat tangga tebal 15 cm	66.29	kg	Rp 15,040.30	Rp 997,021.49	
Beton K-300	1.53	m3	Rp 1,075,033.31	Rp 1,644,800.96	
Bekisting	2.74	m2	Rp 332,788.50	Rp 911,840.49	
Pembesian dengan besi polos dan ulir	155.29	kg	Rp 15,040.30	Rp 2,335,608.19	
Pekerjaan Beton Praktis					
Sloof praktis 15x 20					
Beton K-175	1.94	m3	Rp 963,514.14	Rp 1,864,399.86	
Bekisting	32.25	m2	Rp 173,272.00	Rp 5,588,022.00	
Pembesian dengan besi polos dan ulir	292.19	kg	Rp 15,040.30	Rp 4,394,550.06	
Kolom praktis 15x15					
Beton K-175	5.78	m3	Rp 963,514.14	Rp 5,572,387.67	
Bekisting	115.67	m2	Rp 288,788.50	Rp 33,403,588.22	
Pembesian dengan besi polos dan ulir	884.35	kg	Rp 15,040.30	Rp 13,300,943.71	
Pekerjaan Beton Rabat dan Lantai Kerja					
Pek. Lantai kerja beton K-175 tebal 10 cm					
	4.90	m3	Rp 963,514.14	Rp 4,717,365.22	
				Total	Rp 492,428,986.33

PEKERJAAN KUSEN PINTU DAN JENDELA						
Kusen dan daun pintu P1 + Aksesoris	4.00	unit	Rp	1,993,062.50	Rp	7,972,250.00
Kusen dan daun pintu P2 + Aksesoris	12.00	unit	Rp	2,454,897.50	Rp	29,458,770.00
Kusen dan daun pintu P3+ Aksesoris	8.00	unit	Rp	1,884,712.50	Rp	15,077,700.00
Kusen dan daun pintu P6 + Aksesoris	4.00	unit	Rp	1,000,752.50	Rp	4,003,010.00
Kusen dan daun pintu P7 + Aksesoris	1.00	unit	Rp	6,804,375.00	Rp	6,804,375.00
Kusen dan daun jendela J1 + Aksesoris	15.00	unit	Rp	3,636,693.50	Rp	54,550,402.50
Kusen dan daun jendela J2 + Aksesoris	8.00	unit	Rp	1,810,594.50	Rp	14,484,756.00
BV 1 + Aksesoris	10.00	unit	Rp	402,902.50	Rp	4,029,025.00
					Total	Rp 136,380,288.50
PEKERJAAN PELAPIS LANTAI, PELAPIS DINDING , REALING DAN PLIN						
Keramik lantai ukuran 60 x 60	506.20	m2	Rp	318,695.76	Rp	161,323,792.87
Keramik lantai KM/WC ukuran 20 x 20	34.20	m2	Rp	197,692.83	Rp	6,761,094.62
Plin keramik ukuran 10 x 30	28.20	m'	Rp	29,476.83	Rp	831,158.13
					Total	Rp 168,916,045.61
PEKERJAAN PLAFON						
Langit-langit gypsumboard	522.01	m2	Rp	48,625.50	Rp	25,382,900.00
Rangka besi hollow 40x40x2 mm, modul 60 x 60, plafon	522.01	m2	Rp	137,181.00	Rp	71,609,579.45
					Total	Rp 96,992,479.45
PEKERJAAN MEKANIKAL ELEKTRIKAL						
INSTALASI AIR BERSIH						
Pembuatan Sumur bor lengkap + Pompa air (submersible)	1.00	unit	Rp	25,000,000.00	Rp	25,000,000.00
Rooftank kapasitas 1000L	4.00	unit	Rp	3,800,000.00	Rp	15,200,000.00
Jaringan pipa air bersih dengan pipa PVC	29.48	m'	Rp	21,617.75	Rp	637,291.27
					Sub total A	Rp 40,837,291.27
PEKERJAAN INSTALASI AIR KOTOR						
Jaringan air kotor, pipa PVC dia. 3"	66.19	m'	Rp	84,499.25	Rp	5,593,005.36
Bak Air Kotor	6.00	unit	Rp	776,613.75	Rp	4,659,682.50
Biofil BF-04 kap.1850 lt	2.00	unit	Rp	11,275,000.00	Rp	22,550,000.00
Biofil BF-06 kap.2145 lt	4.00	unit	Rp	13,475,000.00	Rp	53,900,000.00
Sumur peresapan	6.00	unit	Rp	3,000,000.00	Rp	18,000,000.00
					Sub total B	Rp 104,702,687.86
PEKERJAAN ELEKTRIKAL						
Instalasi listrik titik lampu dan stop kontak	149.00	titik	Rp	101,200.00	Rp	15,078,800.00
Instalasi AC 1 PK	1.00	titik	Rp	200,000.00	Rp	200,000.00
Instalasi AC 1,5 PK	5.00	titik	Rp	200,000.00	Rp	1,000,000.00
Pemasangan stop kontak	20.00	bh	Rp	53,900.00	Rp	1,078,000.00
Pemasangan stop kontak AC	6.00	bh	Rp	89,650.00	Rp	537,900.00
Pas. Lampu TL 2x18 W	90.00	bh	Rp	299,750.00	Rp	26,977,500.00
Pas. Lampu SL 14 W	33.00	bh	Rp	51,700.00	Rp	1,706,100.00
Pas. Saklar tunggal	10.00	bh	Rp	42,900.00	Rp	429,000.00
Pas. Saklar ganda / double	27.00	bh	Rp	62,150.00	Rp	1,678,050.00
					Sub total C	Rp 48,685,350.00
					Total	Rp 194,225,329.13
PEKERJAAN PENGECATAN						
Cat dinding dalam	671.13	m2	Rp	2,644,825.00	Rp	1,775,025,633.97
Cat dinding luar	671.13	m2	Rp	219,450.00	Rp	147,279,829.62
Cat Plafond	522.01	m2	Rp	219,450.00	Rp	114,554,655.60
					Total	Rp 2,036,860,119.19

PEKERJAAN SANITAIR						
Pasang Kran air 3/4"	8.00	bh	Rp	108,185.00	Rp	865,480.00
Pasang Closet Duduk	8.00	unit	Rp	2,095,720.00	Rp	16,765,760.00
Pasang Floor drain	8.00	bh	Rp	144,897.50	Rp	1,159,180.00
					Total	Rp 18,790,420.00
PEKERJAAN DRAINASE						
Saluran drainase	126.20	m'	Rp	595,884.76	Rp	75,200,657.19
Bak kontrol	6.00	m'	Rp	421,770.25	Rp	2,530,621.50
					Total	Rp 77,731,278.69
					Total Seluruh Pekerjaan Lantai 1	Rp 3,401,257,336.07



2nd FLOOR

URAIAN PEKERJAAN	VOL	SAT	HARGA SATUAN	JUMLAH HARGA	TOTAL
PEKERJAAN PASANGAN DAN PLESTERAN					
Pasangan Bata	1534.88	m2	Rp 109,495.38	Rp 168,062,261.18	
Plesteran	2746.47	m2	Rp 56,355.42	Rp 154,778,481.64	
Acian	2746.47	m2	Rp 33,671.00	Rp 92,476,398.10	
				Total	Rp 415,317,140.92
PEKERJAAN STRUKTUR BETON					
Pekerjaan Beton Struktur					
Kolom K1 40x40					
Beton K-300	20.74	m3	Rp 1,075,033.31	Rp 22,291,890.72	
Bekisting	33.18	m2	Rp 288,788.50	Rp 9,581,309.34	
Pembesian dengan besi polos dan ulir	3812.82	kg	Rp 15,040.30	Rp 57,346,003.25	
Balok B1					
Beton K-300	41.04	m3	Rp 1,075,033.31	Rp 44,119,367.05	
Bekisting	355.68	m2	Rp 294,893.50	Rp 104,887,720.08	
Pembesian dengan besi polos dan ulir	5639.31	kg	Rp 15,040.30	Rp 84,816,860.05	
Balok B2					
Beton K-300	7.24	m3	Rp 1,075,033.31	Rp 7,783,241.17	
Bekisting	90.50	m2	Rp 294,893.50	Rp 26,687,861.75	
Pembesian dengan besi polos dan ulir	1232.18	kg	Rp 15,040.30	Rp 18,532,290.68	
Plat lantai tebal 12 cm					
Beton K-300	71.28	m3	Rp 1,075,033.31	Rp 76,624,504.23	
Bekisting	593.97	m2	Rp 332,788.50	Rp 197,666,385.35	
Pembesian dengan besi polos dan ulir	14065.03	kg	Rp 15,040.30	Rp 211,542,300.79	
Plat bordes tebal 15 cm					
Beton K-300	0.54	m3	Rp 1,075,033.31	Rp 580,517.99	
Bekisting	3.60	m2	Rp 332,788.50	Rp 1,198,038.60	
Plat tangga tebal 15 cm					
Beton K-300	1.53	m3	Rp 1,075,033.31	Rp 1,644,800.96	
Bekisting	10.20	m2	Rp 332,788.50	Rp 3,394,442.70	
Pekerjaan Beton Praktis					
Kolom praktis 15x15					
Beton K-175	7.53	m3	Rp 963,514.14	Rp 7,258,152.01	
Bekisting	150.66	m2	Rp 288,788.50	Rp 43,508,875.41	
Pembesian dengan besi polos dan ulir	1151.89	kg	Rp 15,040.30	Rp 17,324,758.61	
				Total	Rp 936,789,320.72
PEKERJAAN KUSEN PINTU DAN JENDELA					
Kusen dan daun pintu P1 + Aksesoris	7.00	unit	Rp 1,993,062.50	Rp 13,951,437.50	
Kusen dan daun pintu P2 + Aksesoris	12.00	unit	Rp 2,454,897.50	Rp 29,458,770.00	
Kusen dan daun pintu P4+ Aksesoris	2.00	unit	Rp 2,655,922.50	Rp 5,311,845.00	
Kusen dan daun pintu P6 + Aksesoris	4.00	unit	Rp 1,000,752.50	Rp 4,003,010.00	
Kusen dan daun pintu P7 + Aksesoris	1.00	unit	Rp 6,804,375.00	Rp 6,804,375.00	
Kusen dan daun jendela PJ2 + Aksesoris	6.00	unit	Rp 3,881,652.50	Rp 23,289,915.00	
Kusen dan daun jendela J1 + Aksesoris	5.00	unit	Rp 3,636,693.50	Rp 18,183,467.50	
Kusen dan daun jendela J2 + Aksesoris	7.00	unit	Rp 1,810,594.50	Rp 12,674,161.50	
Kusen dan daun jendela J3 + Aksesoris	2.00	unit	Rp 3,214,409.00	Rp 6,428,818.00	
BV 1 + Aksesoris	15.00	unit	Rp 402,902.50	Rp 6,043,537.50	
BV 2 + Aksesoris	3.00	unit	Rp 738,842.50	Rp 2,216,527.50	
				Total	Rp 128,365,864.50

PEKERJAAN PELAPIS LANTAI, PELAPIS DINDING , REALING DAN PLIN						
Keramik lantai ukuran 60 x 60	531.02	m2	Rp	318,695.76	Rp	169,233,821.59
Keramik lantai KM/WC ukuran 20 x 20	40.80	m2	Rp	197,692.83	Rp	8,065,867.26
Plin keramik ukuran 10 x 30	48.83	m'	Rp	29,476.83	Rp	1,439,206.14
					Total	Rp 178,738,894.99
PEKERJAAN PLAFON						
Langit-langit gypsumboard	594.01	m2	Rp	48,625.50	Rp	28,884,033.26
					Total	Rp 28,884,033.26
PEKERJAAN MEKANIKAL ELEKTRIKAL						
INSTALASI AIR BERSIH						
Jaringan pipa air bersih dengan pipa PVC	43.06	m'	Rp	21,617.75	Rp	930,860.32
					Sub total A	Rp 930,860.32
PEKERJAAN INSTALASI AIR KOTOR						
Jaringan air kotor, pipa PVC	87.18	m'	Rp	84,499.25	Rp	7,366,644.62
					Sub total B	Rp 7,366,644.62
PEKERJAAN ELEKTRIKAL						
Instalasi listrik titik lampu dan stop kontak	157.00	titik	Rp	101,200.00	Rp	15,888,400.00
Instalasi AC 1 PK	12.00	titik	Rp	200,000.00	Rp	2,400,000.00
Pemasangan stop kontak	35.00	bh	Rp	53,900.00	Rp	1,886,500.00
Pemasangan stop kontak AC	6.00	bh	Rp	89,650.00	Rp	537,900.00
Pas. Lampu TL 2x18 W	21.00	bh	Rp	299,750.00	Rp	6,294,750.00
Pas. Lampu SL 14 W	95.00	bh	Rp	51,700.00	Rp	4,911,500.00
Pas. Saklar tunggal	6.00	bh	Rp	42,900.00	Rp	257,400.00
Pas. Saklar ganda / double	38.00	bh	Rp	62,150.00	Rp	2,361,700.00
					Sub total C	Rp 34,538,150.00
					Total	Rp 42,835,654.93
PEKERJAAN PENGECATAN						
Cat dinding	1373.24	m2	Rp	2,644,825.00	Rp	3,631,966,523.36
Cat Plafond	594.01	m2	Rp	219,450.00	Rp	130,355,494.50
					Total	Rp 3,762,322,017.86
PEKERJAAN SANITAIR						
Pasang Kran air 3/4"	12.00	bh	Rp	108,185.00	Rp	1,298,220.00
Pasang Closet Duduk	12.00	unit	Rp	2,095,720.00	Rp	25,148,640.00
Pasang Floor drain	12.00	bh	Rp	144,897.50	Rp	1,738,770.00
					Total	Rp 28,185,630.00
PEKERJAAN DRAINASE						
Pipa drainase 4"	28.80	m'	Rp	123,714.25	Rp	3,562,970.40
					Total	Rp 3,562,970.40
					Total Seluruh Pekerjaan Lantai 2	Rp 5,525,001,527.58

3RD FLOOR

PEKERJAAN RANGKA ATAP DAN PENUTUP ATAP						
Rangka Atap Baja Ringan	521.68	m2	Rp	292,820.00	Rp	152,758,107.67
Pemasangan Atap Genteng Metal berpasir	521.68	m2	Rp	98,774.50	Rp	51,528,603.60
Lisplank ukuran 3 x 20 cm	142.00	m'	Rp	79,260.50	Rp	11,254,991.00
						Total Rp 215,541,702.27
PEKERJAAN PLAFON						
Langit-langit gypsumboard	612.02	m2	Rp	48,625.50	Rp	29,759,584.01
Rangka besi hollow 40x40x2 mm, modul 60 x 60, plafor	612.02	m2	Rp	137,181.00	Rp	83,956,966.90
						Total Rp 113,716,550.90
PEKERJAAN MEKANIKAL ELEKTRIKAL						
INSTALASI AIR BERSIH						
Jaringan pipa air bersih dengan pipa PVC	68.88	m'	Rp	21,617.75	Rp	1,489,030.62
						Total Rp 920,916.15
PEKERJAAN INSTALASI AIR KOTOR						
Jaringan air kotor, pipa PVC	73.46	m'	Rp	84,499.25	Rp	6,207,314.91
						Total Rp 6,207,314.91
PEKERJAAN ELEKTRIKAL						
Instalasi listrik titik lampu dan stop kontak	176.00	titik	Rp	101,200.00	Rp	17,811,200.00
Instalasi AC 1 PK	16.00	titik	Rp	200,000.00	Rp	3,200,000.00
Pemasangan stop kontak	37.00	bh	Rp	53,900.00	Rp	1,994,300.00
Pemasangan stop kontak AC	17.00	bh	Rp	89,650.00	Rp	1,524,050.00
Pas. Lampu TL 2x18 W	21.00	bh	Rp	299,750.00	Rp	6,294,750.00
Pas. Lampu SL 14 W	101.00	bh	Rp	51,700.00	Rp	5,221,700.00
Pas. Saklar tunggal	2.00	bh	Rp	42,900.00	Rp	85,800.00
Pas. Saklar ganda / double	38.00	bh	Rp	62,150.00	Rp	2,361,700.00
						Sub total C Rp 38,493,500.00
						Total Rp 45,621,731.06
PEKERJAAN PENGECATAN						
Cat dinding dalam	1683.41	m2	Rp	219,450.00	Rp	369,424,324.50
Cat dinding luar	1683.41	m2	Rp	219,450.00	Rp	369,424,324.50
Cat Plafond	612.02	m2	Rp	219,450.00	Rp	134,306,911.20
						Total Rp 873,155,560.20
PEKERJAAN SANITAIR						
Pasang Kran air 3/4"	8.00	bh	Rp	108,185.00	Rp	865,480.00
Pasang Closet Duduk	8.00	unit	Rp	2,095,720.00	Rp	16,765,760.00
Pasang Floor drain	8.00	bh	Rp	144,897.50	Rp	1,159,180.00
Pasang Wastafel	8.00	bh	Rp	1,154,579.25	Rp	9,236,634.00
						Total Rp 28,027,054.00
PEKERJAAN DRAINASE						
Pipa drainase	28.80	m'	Rp	123,714.25	Rp	3,562,970.40
Pemasangan Roofdrain	8.00	bh	Rp	106,397.50	Rp	851,180.00
						Total Rp 4,414,150.40
						Total Seluruh Pekerjaan Lantai 3 Rp 3,298,368,111.30