Data Sheet

You will be simulating Design Project 3 entitled “Power Flow/Short Circuits”. Use Figure 6.23 for your project and assume L2 = 50 km.

Table 1: Transmission Line Data

Bus-Bus	**R (ohms)**	**X (ohms)**	**B (S)**	**R (p.u.)**	**X (p.u)**	**B (p.u)**
2-3	1.2	7.5	.0000495	.002268	.01418	.02619
3-4	4	25	.000165	.007561	.04726	.08729
4-5	3.2	20	.000132	.006049	.03781	.06983
4-6	4	25	.000165	.007561	.04726	.08729
5-6	1.2	7.5	.0000495	.002268	.01418	.02619

Table 2: Bus Input Data

Bus	Type	V (p.u.)	Delta	Gen(P)	Gen(Q)	Load(P)	Load(Q)
1	Slack	1	0				
2	Load					.5	.3
3	Load					.5	.3
4	Load					.5	.3
5	Load					.5	.3
6	Load					.5	.3
7	Gen	1		1.8			

Table 3: Transformer Input Data

Bus - Bus	**R(ohms)**	**X (p.u)**	**Max MV (p.u.)**
1-2		.1	1
6-7		.05	1.0