

Daily System Generation Summary on Monday

Monday, January 20, 2020

Availability at Daily Maximum Demand Hour

ST-Coal	0 MW
ST-Gas	0 MW
ST-Oil	0 MW
Hydro	2,454 MW
Distillate	0 MW
Total TNB	2,454 MW
Total IPP	17,647 MW
Total Co-Gen	0 MW
Total System	22,576 MW

Generation Mix

Type	MWh	Percentage
Hydro	10,370	2.79 %
Gas	27,668	7.45 %
Total TNB	38,038	10.25 %
ST-Coal	240,514	64.78 %
LSS	2,359	0.64 %
Gas	90,070	24.26 %
Total IPP	332,943	89.68 %
Co-Gen	206	0.06 %
Total Co-Gen	206	0.06 %
Total Generation	371,187	99.98 %
PLTG	392	0.11 %
HVDC	-457	-0.12 %
Interconnection	-65	-0.02 %
Net Energy	371,252	100.00 %

Maximum Demand Record

Date: 4/18/2019	18,566 MW
Date: 4/18/2019	391,845 MWH

Set On Bus, TNB, IPP And MD

Daily Maximum Demand Hour at:	16:30:00 Hour
Total Set On Bus	19,378 MW
TNB Generation	2,331 MW
IPP Generation	15,464 MW
Spinning Reserve	1,575 MW
Maximum Demand	17,787 MW
Net Energy	371,252 MWH
Load Factor	86.97 %

Fuel Cost

Total Cost:	59,055,806.05 RM
Cost per Unit	15.90 cents/kWH

Average Spinning Reserve During Peak Hour

Type	MW
GT	436
Hydro	344
Syncon	915
Thermal	155
Total	1,850

Time Weather Temperature

Afternoon	Hot	34
Morning	Sunny	28

Gas Usage

Station	(mmscfd)
GLGR	49
TJGS	152
Total TNB	201
CBPS	50
KLPP	82
NPRI	147
PGLA	105
PLPS	55
SGRI	59
YPKA	45
Total IPP	544
Total Gas	745
Total Gas Required	745

Alternate Fuel Usage

Station	(mmscfd)
Total	0

Hourly System MW Generation

	00:00	01:00	02:00	03:00	04:00	05:00	06:00	07:00	08:00	09:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00
System Total	14512	13803	13295	12959	12617	12467	12755	12869	13492	15429	16270	16923	16839	16638	17298	17707	17668	17426	16308	16096	17161	17140	16658	16181

Prepared By: -Select Name-

Checked By: -Select Name-

Printed on: Monday, March 09, 2020 2:06:40 PM

(Ir. Shanmugam Thoppalan)
Pengurus Besar Kanan
Jabatan Sistem Operasi

Daily MW Generation on Monday

Station	Unit	0000	0100	0200	0300	0400	0500	0600	0700	0800	0900	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000	2100	2200	2300																								
YPAK	GT12	0	0	0	0	0	0	0	0	0	0	0	0	0	14	128	134	135	135	132	133	132	69	68	103	128	128	128	128	128	128	125	69	68	69	69	125	126	126	127	126	126	126	111	64				
YPAK	ST10	32	31	32	32	32	32	32	31	32	32	32	32	31	31	31	50	111	125	127	127	126	123	80	78	98	117	119	119	120	122	119	117	81	80	81	81	118	119	119	119	119	120	119	116	84			
Total CCGT-Gas		4141	3942	3709	3897	3683	3495	3324	3130	3000	3150	3192	3236	3316	3473	3298	3375	3843	4733	4867	5024	5436	5517	5598	5727	5404	5301	5318	5446	6038	6069	6220	6244	6166	6288	6050	5787	5564	5202	5341	5985	6131	6150	6165	5902	5772	5874	5574	5393
Total OCGT-Gas		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
BSIA	HY01	21	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12	22	22	22	22	22	22	22	12	12	12			
BSIA	HY02	21	11	11	11	11	11	11	12	11	11	12	11	11	12	12	11	11	11	21	21	22	21	21	22	21	22	22	22	22	22	22	22	22	22	21	21	21	21	21	21	21	21	11	11	12			
BSIA	HY03	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	22	22	22	22	22	22	12	12	12				
CEND	HY01	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10			
CEND	HY02	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10			
HTRG	HY01	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	0	0	0			
HTRG	HY02	0	0	0	0	0	0	0	0	66	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1		
KNRG	HY02	36	23	22	24	23	23	23	23	23	23	23	23	23	23	24	23	24	23	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36	36		
KNYR	HY01	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	99	99	98	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97		
KNYR	HY02	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
KNYR	HY03	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
KNYR	HY04	59	55	55	60	59	58	58	57	56	90	60	67	76	64	60	59	63	86	71	66	61	60	59	93	99	98	98	98	98	98	98	98	98	98	98	98	98	98	98	98	98	98	98	98	98	98	98	
LPIA	HY01	23	23	23	23	23	23	23	23	23	23	23	23	18	18	19	19	20	20	21	21	21	21	23	23	23	22	22	22	22	20	20	20	20	20	20	20	20	20	20	20	20	20	22	22	0	0	0	0
MNOR	HY01	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	5	5	3	3	3	3	3	3	3	5	5	5	5	5	5	5	3	3	3	3	3	3	3	3	3	6	6	3	3	3	
PGAU	HY01	-1	-1	-1	-1	-1	-1	-1	-1	-1	21	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1		
PGAU	HY02	0	0	0	0	0	0	0	0	0	0	0	0	0	0	20	-1	-1	19	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	21	21	21	21	21	21	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	
PGAU	HY03	-1	-1	-1	-1	-1	-1	-1	19	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1			
SIHY	HY01	30	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	31	31	51	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
SIHY	HY02	30	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
SYPS	HY01	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
SYPS	HY02	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
SYPS	HY03	17	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
SYPS	HY04	15	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
TMGR	HY01	34	33	32	33	34	32	33	33	32	34	33	33	34	33	33	33	34	34	33	52	52	52	52	31	31	52	52	52	52	51	52	52	-1	-1	-1	-1	51	52	52	52	52	52	-1	-1	-1			
TMGR	HY02	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	54	54	54	54	33	33	53	55	54	54	54	54	54	54	33	33	30	33	52	54	54	54	55	54	33	33	33	33			
TMGR	HY03	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	51	51	50	50	30	30	50	51	51	50	50	48	50	50	30	30	27	30	49	51	50	50	50	30	30	-1	0			
TMGR	HY04	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	51	51	51	51	30	31	51	52	51	51	51	49	51	51	31	31	28	31	49	51	51	51	51	31	31	0	0			
UJLI	HY01	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	96	96	94	95	98	-1	-1	-1	-1	2	-1	-1	98	95	101	86	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1			
UJLI	HY02	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1	-1				
UPIA	HY01	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4				
UPIA	HY02	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2				
Total Hydro		308	167	165	173	172	169	170	169	187	292	171	178	189	175	167	186	172	194	201	271	267	559	660	751	705	640	620	721	716	836	858	956	945	1034	916	613	306	249	271	460	592	590	556	657	444	244	183	186
Total Distillate		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
BDLS	LSS1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	4	7	12	16	19	21	23	25	26	27																							

Daily MW Generation on Monday

Station	Unit	0000	0100	0200	0300	0400	0500	0600	0700	0800	0900	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000	2100	2200	2300																									
PCUF	CUFG	3	3	5	4	4	3	4	4	4	2	3	4	4	3	5	4	2	3	5	3	3	4	4	2	3	4	2	4	4	5	5	4	4	4	4														
PCUF	CUFK	4	6	7	7	6	4	6	5	5	2	4	3	4	6	4	5	6	5	7	6	4	5	6	4	1	4	6	5	5	5	4	6	5	5	5	7	5	5	3	4	5	5							
Total Co-Gen		7	9	12	11	10	7	10	9	9	4	7	7	7	11	7	8	9	10	8	11	10	6	9	11	10	8	8	11	8	3	7	11	8	8	9	8	8	8	9	7	9	11	10	10	7	8	9	9	
Total Gen		14565	14188	13822	13553	13282	13088	12922	12724	12625	12561	12467	12562	12720	13033	12878	12988	13457	14600	15396	15829	16258	16652	16868	17115	16810	16607	16575	16854	17456	17569	17689	17753	17661	17803	17445	16851	16310	15902	16046	16849	17137	17159	17126	16989	16638	16523	16174	15991	
TIE-EGAT		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0				
TIE-HVDC		30	30	30	-30	-29	-29	-30	-30	-29	-29	-29	-29	-29	-30	-30	-28	-28	-29	-29	-29	-29	-29	-29	-29	-29	-29	-29	-29	278	-30	-29	-29	-29	-29	-29	-28	-28	-29	-29	-29	-29	-29	-29	-29	-29	-29	-29		
TIE-PLTG		30	15	-5	-27	23	85	1	27	45	38	36	-4	1	72	46	61	1	-21	2	-32	24	24	-19	30	8	29	-27	-35	-113	44	19	34	30	51	55	23	38	17	-15	2	12	17	22	24	16	27	29	27	
Interconnection		60	45	26	-57	-6	56	-29	-3	16	9	7	-33	-28	42	16	31	-28	-49	-26	-61	-5	-6	-48	1	-22	-1	-56	-64	165	14	-11	4	0	23	26	-7	9	-11	-43	-27	-17	-13	-7	-5	-13	-2	0	-3	
System Total		14512	14150	13803	13617	13295	13039	12959	12735	12617	12560	12467	12602	12755	12998	12869	12964	13492	14656	15429	15897	16270	16665	16923	17121	16839	16615	16638	16925	17298	17562	17707	17756	17668	17787	17426	16865	16308	15920	16096	16883	17161	17179	17140	17001	16658	16532	16181	16001	
SRev ST-Coal		451	487	535	584	562	558	555	559	550	749	760	723	698	599	563	560	560	561	279	137	147	171	145	161	142	153	155	142	132	150	164	153	135	167	145	138	183	157	139	158	150	147	160	135	140	158	147	152	
SRev OCGT-Gas		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
SRev CCGT-Gas		572	771	851	663	877	1065	1236	1430	1560	1410	1508	1464	1384	1227	1478	1436	1186	498	582	540	419	338	333	344	842	988	971	843	498	437	286	262	340	238	456	719	942	1304	1165	537	427	408	437	481	621	528	828	1009	
SRev ST-Gas		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
SRev LSS		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
SRev Co-Gen		63	61	58	59	60	63	60	61	61	66	63	63	63	59	63	62	61	60	62	59	60	64	61	59	60	62	62	59	62	67	63	59	62	62	61	62	62	62	61	63	61	59	60	60	63	62	61	61	
Syncon		991	991	991	991	991	991	991	991	840	840	1017	1017	1017	1017	1017	1117	1138	1138	1117	1081	1081	993	892	892	1079	928	1079	928	892	1079	928	741	741	741	741	1015	1267	1267	1267	1079	928	928	928	741	878	1141	1229	1141	
Hydro		169	136	138	130	131	134	132	133	266	227	131	124	113	127	135	136	129	107	251	217	221	340	340	249	158	374	243	294	335	228	357	446	457	368	386	315	270	251	229	252	371	373	407	493	542	254	141	139	
S.Reserve Total		2246	2446	2573	2427	2621	2811	2974	3174	3277	3292	3479	3391	3275	3029	3256	3311	3074	2364	2291	2034	1928	1906	1771	1705	2281	2505	2510	2266	1919	1961	1798	1661	1735	1576	1789	2249	2724	3041	2861	2089	1937	1915	1992	1910	2244	2143	2406	2502	