Table 4.4 Calculation Results by Y-method

(Excitation System Model: LAT = 1, Load Characteristic: Constant Current [NLT = 2])

[Excitation System winder: LAI – 1, Load Characteristic: Constant Current [NLI – 2])				
Branch,	Daytime Condition		Nighttime Condition	
Fault Location	1 cct. 3LG-O	2 cct. 3LG-O	1 cct. 3LG-O	2 cct. 3LG-O
2101 (Point A)	(Add.) 1st			
, , ,	[G1]			
2102 (Point B)	(Fig.) N th (7 sec)	1st		1st
	[G1]	[G1]		[G1]
2103	N th (7 sec)	1st	1st	1st
	[G1]	[G1, etc.]	[G1]	[G1, etc.]
2104-2105	Stable	1st	N th (6s)	1st
		[G6, etc.]	[G1, etc.]	[G5, etc.]
2107-2108	(Fig.) Stable	1st		1st
(Point C)		[G7, etc.]		[G1, etc.]
3104 (Point D)		N th (9 sec)		(Fig.) Stable
,		[G9, etc.]		
3105	Stable	Stable	Stable	Stable
3108	Stable	Stable	Stable	Stable
3109	Stable	Stable	Stable	Stable
3110	Stable	Stable	Stable	Stable
3112		1st		1st
		[G17, etc.]		[G17, etc.]
3124	Stable	Stable	Stable	Stable
3128	Stable	Stable	Stable	Stable
3129	Stable	Stable	Stable	Stable
3133	Stable	Stable	Stable	Stable
3134	Stable	Stable	Stable	Stable

Legend:

1st : Step-out in 1st internal angle swing after the fault is cleared.

N th : Step-out in several swings after the fault is cleared.

: In this case, the calculation results are shown in graph figures.

(Add.) : In this case, the excitation system model (LAT) is changed as additional case.

(? sec) : Approximate time that any generator is step-out.

[G?] : Generator(s) No. that is step-out.

: Fault Duration Time is 70 [ms] in all cases.

Note2 : The "Step-Out" is judged when the generator internal angle is more than 360 [deg]

from the reference generator G18.