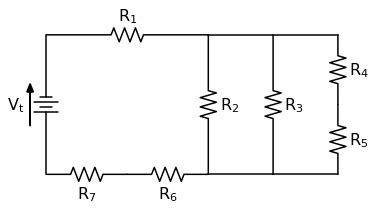
Program Distribution Game

(Overall completed but still not finished)

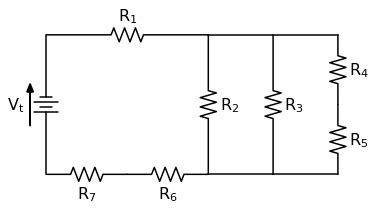
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* Concept of program
* Feature of program
* Constraint of program
* Library used
* Detail of Program



This Program make asumption that there is generator, the village as consumer with the village load change each time within program we try simulate it with randomized event. even though we could input that in simulation menu, and there is a consumer who will plug in his e-device in that environment,when he plug in the load and the current in last loop (which is we assume the consumer position always on last loops) we could calculate Power with equation Pcons=I2R then we include the capacity of power generated by generator which we assume as 10 (we not include the dimension because it just simulation and we could change it) with that we could compare wheter the Pcons  < Pgen and the program continue in real time which is simulated by doing infinity close loop while.We use Matrix method for finding I from value of R and V from every loop.

 R I V

I3

I2

I1

From picture we get

With method I3 = Det A/Det R

where matrix A mean ,we change matrix R with V in last column. the 3 in this mean 3 is last loop.For the member of matrix R with (–) mean they interact with I other than I that dominant in that loop for example in 21 –R2 because R2 interact with I2 dominant in loops because have same number with number of loop(loop 2).The other example in 12 where R2 interact with R1, for the dominant diogonal(11,22,33) it mean the R in dominant I.

So our I3 will become

We use upper triangular to find determinan for both A and R. After that we ask the load of new plug in device (R beban pengguna) then we got Pcons=I2 R . Next we compare it with Capacity of generator , Pload> Pgen we add another generator paralelly then check again if the number of generator reach limit when Pload still bigger we do try simulate system automatically call the other contributor so they could turn on their free generator and transfer power. For program simplicity we finish on just calling.

The Feature:

1, Automatically random In for every 5 second to make simulation that load always change for every second.

2.Randomize load to make system more dynamic

3.Even though for normal mean the program produce random I periodically we provide in menu the simulation feature for analitic where user could input the matrix of R and V then program will ask the R beban pengguna then got P and immediately compare it.

4; The next feature even thought incomplete when PGenerator less than Pcons ­ we do call.

5.Manual onoff feature to simulate where the plan need manually turn on/off generator for maintanence reason or another. So the operator could just typing 1 on (1 is id generator and on condition) For the input of condition there is already checking algorithm and incase sensitive so no problem as long they input on or off another condition we could input selesai mean we already finish. This because the manual on/off menu provide on/off sequence until you input selesai.

6.Notifikasi but not finisih yet.

7. Check status of generator in menu 1.

Constraint : Number of generator limit upto 10, Loop limit up to 10. Only using Real Load, not yet inculde impendance or reactive load. There still no way to tracing back due to no record algorithm, Only limit the user in last loop not think provide where user want to plugin, in simulation still use matrix input(less friendly) so the user need to understand how to input.

Library used:

#include <stdio.h>

#include <time.h>

#include <math.h>

#include <time.h>

#include <conio.h>

#include <stdlib.h>

#include <strings.h>

Detail program : Check it out in program because I already do segmentation comment.