Abstract

Bandung Raya has various famous tourist attraction and is often visited by tourists. Those tourist attractions influence the decision to travel. Travelers who choose to use the services of travel agencies usually want to visit multiple locations at once by striving for a short time. Through this final project, the authors build a system for determining the travel route, using algorithms *Simulated Annealing* (SA).
In process of determining routes or travel lane, the system must be able to give an estimate of the best trips, involving aspects shortest time speed and distance that can be passed along as much as possible to optimize the number of destinations. These are designed with the tour departure point of the hotel where you stayed, then headed dots become tourist sites, to come back to the hotel where tourists stay. Then the approach used is *the Traveling Salesman Problem* (TSP).
The author chose this algorithm to be used with assumptions that SA can solve TSP problems faster than any other algoritm, by doing simulation. TSP calculation by using this algorithm can be used to achieve sub-optimal solutions tested by involving 5-10 tourist destination point. SA algorithm evaluates the parameters by measuring and comparing the value of distance as a parameter. The parameter value is greater than the previous value will be rejected during the iteration, but if found parameter to a smaller value at the time of the iteration, then the parameters that would be acceptable to replace the previous parameter value.

Keywords: route, SA, simulated annealing, TSP, traveling salesman problem.