

Centre median openings are provided in divided roads to facilitate right turns and U-turns so as to provide access to adjoining lands and by-roads. But improper placing of median openings has resulted in interruption to traffic flow thus causing congestions, reduction of design speed and increase in the risk of accidents.

The center median openings on divided multi-lane highways are studied to formulate a mathematical solution that optimizes the spacing of center median openings so that the system cost (road user, operation and maintenance cost) is minimized.

The parameters which influence the spacing of center median openings are taken as slowly varying, with respect to location. An objective function is developed relating the above-identified parameters with the spacing of centre median openings. The objective function is optimized using method of calculus to determine the optimum spacing of centre median openings, which minimize the system cost.

A sensitivity analysis is carried out to investigate the variation of optimum solution as the traffic flow condition varies. In general when the demand for turning is low & through vehicular flow is moderate, closely located median openings provide the optimum solution and when the demand for turning is significant & through vehicular flow is high it suggests to have median openings located far apart. But effect of sight distance, safety,

pedestrians movements, parking lanes, bus halts and intersection control methods etc should also be taken into account.